



## 2023 EURO ASCENTS EQUIPMENT LIST

### EQUIPMENT CHECKLIST

You **MUST** bring all items listed on the clothing and equipment checklist below. Should you require it your guide can supply slings, locking carabiners, non-locking carabiners, belay devices and prusiks as necessary. The only exceptions are items listed as optional. This is very important. At the same time, you must keep your equipment weight to a minimum and please contact us with any questions you may have about the equipment or clothing on this list.

#### Body Wear

- Waterproof shell jacket
- Waterproof shell pants
- Down jacket
- Midweight insulated jacket
- Lightweight fleece top
- Softshell jacket
- Softshell climbing pants
- Base layer top and leggings x 1 set
- Underwear

#### Head Wear

- Sun hat
- Warm hat
- Bandana or Buff
- Sunglasses (plus an optional spare pair)
- Ski goggles

#### Hand Wear

- Liner gloves
- Leather gloves
- Mountaineering gloves

#### Foot Wear

- Socks x 2–3 sets
- Mountaineering boots
- Snow gaiters (only required, if your boots do not have an integrated gaiter)
- Lightweight shoes
- Rock shoes (*optional*)
- Slippers/flip flops/down booties for use in huts

#### Packs & Bags

- Mountaineering pack—40 litres
- Small duffel/travel bag

#### Sleeping Equipment

- Pillow case
- Sleeping bag liner—a requirement for all huts
- Lightweight down sleeping bag (4°C/40°F to 0°C/32°F)—a requirement for some huts
- Ear plugs

#### Accessories

- Hand sanitiser
- Headlamp and spare batteries
- 1 litre water bottles x 2
- Thermos flask (*optional*)
- Personal first aid kit and medications
- Personal toiletries
- Sunscreen and lip balm
- Wet wipes (*optional*)
- Stuff sacks
- Camera and spare batteries (*optional*)
- Personal entertainment (*optional*)
- Pocket knife/Leatherman/tool kit (*optional*)
- Additional snack food

#### Climbing Equipment

- Ice axe—55–66cm
- Crampons
- Climbing harness
- Climbing helmet
- Belay device
- Locking carabiners x 3
- Ice screw (can be rented from AC)
- Prusik x 1 (made from 1.6m of 6mm cord)
- 120cm sling
- Collapsible trekking poles (*optional*)

#### Travel Gear

- Casual wear
- Passport, documents plus copies

## CLOTHING AND EQUIPMENT INFORMATION GUIDE

The following information is a guide to assist you in securing the required clothing and equipment for climbing in the Alps in summer, along with recommended brands. You may have equipment you have used which is different to what is on the list, so please read thoroughly and get back to us with any questions you may have.

### Fabrics/Garment Designs/Garment Selection

Today there is a bewildering and ever-changing array of modern technical fabrics and garments on the market. Accordingly, suitable mountain attire can be derived from a wide variety of garments utilized in varying combinations. The clothing on our gear list can be creatively substituted according to your preferences but ensure your choices are functional and adequate. For example, a functional and often utilized garment that does not appear on our list is a vest.

A basic principle in selecting clothing and equipment is to minimize weight and bulk while still ensuring adequate warmth and functionality. It can be difficult to find a brand that has all the features you prefer which means you must make prudent compromises. In the description below and for certain items, we suggest brands and specific products that we have found to be suitable; this is by no means definitive. In some cases, there are multiple suitable brands on the market and hence we do not make specific suggestions.

Appropriate fabrics used in thermal underwear include polypropylene, silk and merino wool. The only cotton garment worn during the climb is your glacier shirt. Warmer insulating materials can be made from fleece, softshell or Primaloft. Varieties of fleece include Windstopper, Wind Pro, Power Shield, Windbloc, Power Dry and Power Stretch. Be aware that fleece garments that incorporate stretch fabric take longer to dry. Softshell garments integrate stretchy nylon fabrics to increase freedom of movement while also providing various degrees of wind and water-resistance in a 'softshell'. They are often lined with a microfleece for increased insulation. Synthetic insulation materials such as Primaloft are advantageous as they are warm even when damp, are water-resistant and quick-drying.

You can read Guy Cotter's thoughts on the ultimate lightweight layering system at: <http://adventureconsultantsblog.com/optimum-layering/>.

## BODY WEAR

### Waterproof Shell Jacket

Bring a non-insulated, fully waterproof shell jacket with a good hood and water-resistant zip closures. The jacket should be easy to move in with your base and mid-layers on underneath, as well as providing a good overlap with your pants but should not be so long that it restricts access to your harness. Chest pockets are useful to things like snack bars and sunblock during the day. Pit zips allow for increased ventilation and cooling.

There are numerous waterproof/breathable fabrics on the market such as Gore-Tex, eVent, Futurelight, MemBrain, PreCip, Hyvent and Entrant etc. These fabrics can be expensive but last for years when well looked after.

Shell clothing should be seam sealed during the manufacturing process or the garment will leak through the stitching. Shell clothing made of PVC or similar is waterproof but does not breath, which means you can become damp from the inside out as moisture cannot escape while you are moving. This style of waterproof shell is not suitable for mountaineering.

*We recommend The North Face Pumori FUTURELIGHT™ Jacket, Arc'teryx Alpha ARJacket, Montane Phase XT or Alpine Resolve Jackets and the Rab Muztag GTX Jacket.*

### Waterproof Shell Pants

Your waterproof shell pants should allow good freedom of movement to enable you to lift your legs easily when worn with your softshell pants and base layer leggings during inclement weather.

Your shell pants should also have  $\frac{3}{4}$  or full-length (preferred) zips down each leg to allow you to easily put them on and take them off while wearing your boots and/or crampons.

Bib/salopette styles are warmer as they extend above the lower back/kidney area giving a good overlap with your jacket.

*We recommend The North Face Dryzzle FUTURELIGHT™ Pants, Arc'teryx Beta AR Pants, Montane Alpine Resolve Pants or the Rab Muztag GTX Pants.*

### Down Jacket

During the colder winter months, a good quality down jacket can be a lifesaver. A midweight down jacket with a hood is recommended. Although some down jackets have a waterproof/breathable outer fabric, these fabrics are not totally waterproof unless they are seam sealed.

*We recommend The North Face Breithorn Hoodie, Rab Electron Pro Jacket, Montane Anti-Freeze Hooded Down Jacket or the Arc'teryx Cerium LT Jacket.*



Rab Muztag GTX Jacket



Arc'teryx Beta AR Shell Pants



Rab Positron Pro Down Jacket



The North Face FUTUREFLEECE™ Full-Zip Hoodie



Marmot Scree Softshell Pants



Rab Xenon 2.0 Women's Jacket

## Midweight Insulated Jacket

This is a versatile insulating layer that can be worn while active. The jacket can be made from synthetic insulation like Primaloft or similar, insulated softshell or a 200–300 weight fleece (although, fleece has little wind-resistance).

This jacket should have a full front zip for ventilation, zip-up pockets to prevent items from falling out while on the move and a hood is a worthy addition for extra warmth.

*We recommend The North Face Breithorn 50/50 Hybrid or Women's Casaval Hoodie, Rab Xenon 2.0 Jacket, Montane Prism Jacket and the Arc'teryx Atom LT or Atom Hoody*

## Lightweight Fleece Top

A lightweight, air-permeable fleece top made from Polartec Power Stretch, Polartec Power Grid, Polartec Alpha, Pontetorto Tecnopile microfleece or an expedition weight base layer is a good additional layer to add over your base layers when the temperature drops. This layer can either be a pullover or a jacket. Hoods are optional but recommended and a zippered chest pocket can be useful for keeping sunblock and snack bars accessible.

*We recommend The North Face FUTUREFLEECE™ Full-Zip Hoodie, Rab Graviton Hoody, Montane Protium Hooded or Protium fleece hoodie, Patagonia R1® TechFace Hoody or the Arc'teryx Delta LT Jacket or Hoody.*

## Softshell Jacket

These jackets are ideal for aerobic activity in light weather conditions. They are wind-resistant, water-repellent and highly breathable. They are used either alone or as an insulating layer under a waterproof shell jacket and models with a hood are best.

*We recommend the Marmot ROM Hoody, Arc'teryx Gamma MX Hoody, Arc'teryx Gamma SL Hoody or the Rab Vapour-Rise™ Alpine Light, Vapour-Rise™ Summit or Torque Jackets.*

## Softshell Climbing Pants

Softshell pants are made from stretchy, comfortable, wind-resistant and water-repellent materials that are also highly breathable. They are the perfect active layer for your legs. Your pants should fit comfortably with or without your base-layer leggings.

Please note that while softshell pants shed light rain and snow, and will dry quickly when they get wet, but they do not replace your Gore-Tex shell pants, which will still be needed if the weather turns bad.

*We recommend The North Face Chamlang, Marmot Scree, Rab Ascendor AS and the Montane Terra Mission Pants.*

## Base Layer Top and Leggings x 1 Set

Base layers must be made from materials such as merino wool or polyester. Please, no cotton!

Tops should have long sleeves and a high neck with a zip. This allows for better temperature control and sun protection than crew neck styles.



Smartwool Women's Merino Quarter Zip Top



Earth Sea Sky Merino Boxers



Rab Logo Beanie

Base layer leggings should fit snugly without constriction. These can be worn as a single layer on hot days or under your shell or softshell pants when additional warmth is required.

*We recommend Icebreaker, The North Face Summit Series Pro 120 or Pro 200, Rab Syncrino, Earth Sea Sky First Layer and Merino, Arc'teryx Rho, Montane Primino and Smartwool Base Layer Ranges.*

## Underwear

Bring enough changes of underwear to keep you feeling fresh. We recommend treated polyester or merino underwear instead of cotton as they wick away sweat from your skin, working with your thermal, fleece and shell layers to keep you dry. They also dry extremely quickly when washed. However, most people use their normal underwear.

*We recommend the Icebreaker, Smartwool, Rab Syncrino and Sonic, Earth Sea Sky Merino Underwear Ranges.*

## HEAD WEAR

### Sun Hat

A wide-brimmed soft hat or baseball cap in conjunction with a bandana to protect you from the sun.

*We recommend The North Face Horizon Breeze Brimmer Hat.*

### Warm Hat

Your hat can be wool, merino, Windstopper or fleece. It should extend over the ears and be snug enough not to fly off in a strong wind.

*We recommend The North Face Recycled Bones Beanie, Rab Logo Beanie.*

### Bandana or Buff

A fleece, merino wool or silk neck gaiter, neck warmer or Buff is a great idea for added warmth and sun protection. A Buff makes a good face mask in windy cold weather and can replace a balaclava, when used with a warm hat.

*We recommend the Adventure Consultants Branded Buff, available from our office.*

### Sunglasses

Bring sunglasses with good lenses and side-protection. The lens should be dark enough to withstand the intense reflection from the snow and MUST filter 100% of UVA, B and C radiation. Snow reflects up to 85% of solar radiation and the UV index increases 10% with every 1,000m gain in altitude, so it is of utmost importance that you protect your eyes. We recommend photochromic or category 4 polarised lenses with an anti-fog coating.

If you wear prescription glasses, we recommend you get prescription sunglasses with the above specifications. If you wear contact lenses, bring a pair of prescription glacier glasses as a backup.



Leashes are essential and nose guards are optional.

*We recommend Julbo, Smith, Bollé, Oakley and Adidas Sunglasses.*

## Ski Goggles

High-quality goggles for sun and wind protection at altitude. The lens should offer visible light transmission (VLT) of no more than 30%. Those with light-sensitive eyes may wish to use a darker lens. Photochromatic models are ideal for use in changing conditions.

If you wear prescription glasses, please ensure they fit under your goggles.

*We recommend Oakley, Bollé, Adidas, Julbo and Smith Ski Goggles.*

## HAND WEAR

### Liner Gloves

These very thin, lightweight finger gloves form a base layer and are worn whenever climbing. On hot days, they protect against sunburn and can be worn under heavier gloves or mittens on colder days.

Ensure the gloves fit closely to allow you to handle ropes and carabiners easily. Wearing liner gloves will prevent cold injuries in situations requiring full finger dexterity. They can also be worn doubled up and should fit underneath your other glove combinations.

*We recommend Budget polypropylene gloves, available from most hardware or safety stores, Montane Dart Lightweight Liner or the Rab Stretch Knit or Flux Liner Gloves.*

### Leather Gloves

A leather palmed glove that is dexterous is invaluable for the days when climbing on rock or on the warmer mountain days, where you still want hand protection.

*We recommend the Marmot Infinium Windstopper Gloves, Rab Infinium Axis Gloves, Black Diamond Crag Gloves and the Outdoor Research Direct Route II Gloves.*

### Mountaineering Gloves

Gloves with removable insulated liners are extremely versatile as you can wear them with or without the liners depending on the temperature.

A good model will have abrasion-resistant palms, shaped fingers, a waterproof outer and an insulating removable liner. Cheaper models are not waterproof, so it's worth investing in a good quality pair.

Please ensure that you can fit your liner gloves underneath your mountaineering gloves.

Mountaineering gloves are not as warm as expedition mitts but have the advantage of being more dexterous. Because of the time that you will spend dealing with ropes and equipment, the dexterity your gloves provide will be extremely useful.

We recommend that you attach wrist loops to your gloves to prevent them from being dropped or blown away by the wind when you take them off.



Smith IO Ski Goggles



Outdoor Research Direct Route II Gloves



Black Diamond Guide Gloves



Smartwool PHD Outdoor Mountaineer Socks



La Sportiva Nepal Evo GTX Mountaineering Boot



Rab Latok GORE-TEX® Pro Gaiters

*We recommend Black Diamond Guide Gloves and the Outdoor Research Alti II Gloves.*

## FOOT WEAR

### Socks x 2–3 Sets

Have at least two pairs of socks with you for the trip. Socks made from wool or a mix of fibres with good thermal properties are the best choice.

Various combinations suit different people. Some people prefer to wear just one pair of socks in their boots, while others wear two; a thicker pair over a thin liner sock. Try your socks out with your boots before your trip to ensure a good fit. This will help minimise cold toes while you are climbing.

*We recommend Smartwool, Bridgedale, Darn Tough and Thorlos Socks.*

### Mountaineering Boots

An insulated leather mountaineering boot with a fully rigid sole is ideal for climbing in Europe. Ensure that they are waterproof, supportive and warm enough for snow and ice climbing. The boots must have a reasonably sized welt on the back and front to accept 'clip-on' crampons.

Three-quarter shank boots do not give enough support the extended periods of snow and ice climbing as they are too flexible. This style of boot is not generally insulated so they are not warm enough, but some styles are excellent for rock-based mountaineering routes elsewhere in the Alps.

While it is possible to use plastic boots, they have become somewhat outdated, are very clumsy to wear and will not perform well.

New-generation synthetic double boots with removable liners can also be used for higher elevation ascents around Mont Blanc or when it is very cold. However, single leather and synthetic boots are the status quo for summer mountaineering in the Alps.

The right fit is more important with leather boots than for plastic boots, so make sure they are worn in by doing several multi-hour hikes on hills and rough terrain before you wear them in the mountains.

Your boots are perhaps the single most important piece of equipment and can make or break a trip depending on whether they fit well or not, so please ensure your boots are of high-quality and fit your feet well.

*We recommend the Scarpa Mont Blanc Pro GTX and Phantom Tech, La Sportiva Nepal Evo GTX, G5 Evo and the Trango Tower Extreme GTX Mountaineering Boots.*

*For rock-based ascents, we recommend La Sportiva Trango Cube GTX, Scarpa Ribelle HD, Lowa Alpine SL and Salewa Crow GTX Mountaineering Boots.*

### Snow Gaiters (Only Required, If Your Boots Do Not Have an Integrated Gaiter)

Calf-length gaiters with a velcro or zip closure at the front keep the snow out and prevent you snagging your trousers with your crampons. They need a good tie-down system underneath the in-step to stop them creeping up at the heel.



La Sportiva TX4 Approach Shoe



Black Diamond Speed 40 Mountaineering Pack



Sea to Summit Silk Sleeping Bag Liner

*We recommend the Sea to Summit Quagmire eVent Gaiters or the Rab Latok GORE-TEX® Pro Gaiters.*

### Lightweight Shoes

Lightweight shoes are handy for walking around in at the end of the day and for the walkout down the valley. Believe it or not, a pair of Crocs can be good lightweight slippers for use at the huts.

*We recommend the Salomon XA Pro 3D V8, Salewa Wildfire or the La Sportiva TX4 Shoes.*

### Rock Shoes (Optional—Can Be Rented)

Bring these with you if you have them as they are used on training days and non-mountain days. If you don't own a pair, these can be rented locally if needed.

### Down Booties/Slippers/Flip Flops

Bring a pair of down bootie, slippers or flip flops for use around the huts at night.

## PACKS & BAGS

### Small Duffel/Travel Bag

This is for storing clothing and items left in town, while you are out climbing. Bring a lock and if you're good at losing keys, make sure to buy a combination lock and set to an easy to remember number!

*We recommend The North Face Base Camp Duffels and Osprey Transporter Duffels.*

### Mountaineering Pack—40 Litres

There are many models available which are suitable. Required features include a volume of about 40 litres with crampon and ice axe attachment points and compression straps to adjust the capacity when the pack is not full. Avoid trekking style packs with bulky side pockets.

*We recommend the Osprey Mutant 38, Montane Fast Alpine 40, Black Diamond Speed 40 and Crux AX45 Mountaineering Packs.*

## SLEEPING GEAR

### Pillow Case

Bring a clean pillow case to use with the pillows supplied in the mountain huts.

### Sleeping Bag Liner—A Requirement For All Huts

These are for use with the blankets that are sometimes supplied in the huts. They are also an excellent way to keep your sleeping bag clean and add extra warmth.





Sea to Summit Silk Sleeping Bag Liner



Petzl Actik Core Headlamp



Adventure Consultants Branded Nalgene 1 Litre Wide Mouth Bottles

## Lightweight Down Sleeping Bag (4°C/40°F to 0°C/32°F)—A Requirement for Some Huts

This is a requirement at some mountain huts while COVID-19 restrictions are in place. Bring a lightweight, compact down sleeping bag rated to around 4°C/40°F to 0°C/32°F with a half or full zip. You will be sleeping in a hut, so there is no need for any waterproof coatings.

Your sleeping bag should be long enough so that your feet do not press hard against the foot of the bag, as this will compress the insulation and you will lose heat quickly. Make sure there is enough room for you to fit in when wearing lots of layers.

Please note that the ratings quoted above are the sleeping bag's 'Comfort Limit' temperature. If you are a cold sleeper, consider a warmer bag. If you are using the EN temperature ratings when choosing a sleeping bag, a general rule is that most women or 'cold sleepers' should go with the 'Comfort' rating and most men should go with the 'Comfort Limit' rating. Sleeping bags that do not have the EN rating tend to be rated at their 'Comfort Limit' temperature.

*We recommend The North Face Gold Kazoo, Rab Neutrino 400, Marmot Never Winter, or the Mountain Equipment Glacier 300 Down Sleeping Bags.*

### Ear Plugs

A handy way to get a night's sleep when sharing a room with a snorer!

## ACCESSORIES

### Headlamp and Spare Batteries

Headlamps are more versatile than hand torches as they allow you to keep your hands free. High-output LED headlamps are superb as they provide an excellent level of lighting and are also very lightweight. We recommend hybrid headlamps that run on both AAA or AA disposable batteries and rechargeable batteries.

Bring two NEW sets of lithium or alkaline batteries for the trip.

*We recommend the Petzl Actik Core, LED Lenser MH5 and the Black Diamond Storm 450 Headlamps.*

### 1 Litre Water Bottles x 2

Wide-mouthed plastic bottles are a versatile option. Bladder style hydration systems are good in theory but can often freeze and are easily punctured. Metal bottles are not suitable due to the cold air temperatures. Narrow-mouthed bottles are difficult to fill and clean.

*We recommend the Nalgene 1 Litre and 500ml Wide Mouth Bottles.*

### Thermos Flask (Optional)

You can bring an insulated vacuum flask made from stainless steel of about 500ml–1 litre in capacity for hot drinks on the go.

*We recommend Primus and Lifeventure Vacuum Bottles.*

## Personal First Aid Kit and Medications

You should always carry a basic first aid kit including blister tape, second skin, gauze pads, crepe bandage and painkillers.

Include any personal medication you may require and be sure to inform our office and your guide, if you are on prescription medicine.

Store your first aid kit in a waterproof container, if possible and if you do not have one of these, a plastic bag inside a nylon stuff sack usually works well.

## Personal Toiletries

Bring a small toilet kit—flannel, some soap, toothpaste and toothbrush. Keep it light. Don't bring anything that isn't absolutely necessary.

## Sunscreen and Lip Balm

Conditions in the mountains can be extreme, so you will need a bottle or tube of SPF 50 sunscreen. Lip balm (with SPF 15 or higher) is also worth carrying in your pocket for application during the day. Sunscreen loses SPF rating over time; we strongly recommend bringing brand-new sunscreen.

## Wet Wipes (Optional)

Bring a few pre-moistened cloth wipes stored in a zip lock bag for personal hygiene. These antibacterial wipes are excellent for cleaning hands and other hygiene issues while you are in the mountains.

## Stuff Sacks

Lightweight nylon bags with draw cords to store spare clothes, etc are very useful for organising gear in your pack or when you are in a hut. We suggest bringing 2–3 small or medium sized sacks.

*We recommend the Sea to Summit Stuff Sacks and Dry Bags.*

## Camera and Spare Batteries (Optional)

Bring along your choice of either an SLR or fully automatic camera. We recommend using a camera with replaceable batteries, NOT rechargeable, as this allows you to have spare fresh batteries for summit day. Be aware that batteries can be a problem with cold temperatures, so it is a good idea to bring a spare set or two.

Spare batteries should be only carried in carry-on luggage when travelling, as they are likely to be confiscated if carried in your checked luggage.

Don't forget to bring extra memory cards!

## Personal Entertainment (Optional)

Feel free to bring your phone, MP3 player, Kindle or a good book for any downtime.



Personal First Aid Kit



Lip Balm & Sunscreen



Sea to Summit Stuff Sacks

## Pocket Knife/Leatherman/Tool Kit (Optional)

Bring along a Swiss Army Knife, Leatherman or similar knife or multi-tool. A personal repair kit for your equipment is also useful.

*We recommend Victorinox Knives and Leatherman Multi Tools.*

## Additional Snack Food

Bring any of your favourite snacks. We recommend you bring at least 4 energy gel sachets for instant energy on the climb. You may also wish to bring electrolyte powder to mix in your water bottles.

## CLIMBING EQUIPMENT

### Ice Axe—55–66cm

For general alpine climbing, you will need a straight shafted axe between 50–66cm long, depending on your height. A longer axe is more helpful on the moderate ground and even the most difficult climbs have approaches and descents for which this is helpful. Short axes with curved shafts and moulded handgrips are fine on hard technical ice climbs, but not suited for the majority of alpine climbing.

The head of the axe should be comfortable to hold when using the axe as a walking stick and not have any protrusions which will dig into your hand.

The pick can be a normal downward curve or a 'reverse curve'. Reverse curve picks hold better on steep ice but they are more difficult to self-arrest with. Some ice axes come with replaceable picks, so it pays to check that the bolts are tight before each climb.

An adze is still used a lot for chopping steps in the ice and snow, so ensure that the adze has a good angle to do so. Some adzes, particularly on technical axes are designed for climbing steep unconsolidated snow and are too drooped to chop steps easily. Avoid this type of adze for general use.

Ice axe shafts are made from metal, fibreglass or wood and some have rubber handgrips. A rubber grip at the base of the shaft makes it easier to hold when self-arresting or climbing steeper ground, as well as keeping your hand warmer. The shaft must be smooth enough to be forced into the snow and should not have protrusions which can get caught up on a crusty snow surface.

The spike at the bottom of the tool should be sharp enough to penetrate hard snow. A wrist loop is needed for support when climbing on steeper ground. The correct length allows you to hold the bottom of the shaft with the sling tight.

*We recommend the Petzl Summit Evo, Grivel Air Tech Evo G-Bone, Blue Ice Bluebird and Black Diamond Venom Ice Axes.*

### Crampons

Steel crampons with a toe harness and heel bail are best as they fit a variety of boots and are easy to put on in the cold. Ensure your crampons are fitted with 'anti-balling' plates and avoid technical ice climbing crampons with vertical front points.



iPhone



Leatherman Wave Multi Tool



Petzl Summit Evo Ice Axe



Grivel G12 New-Matic Crampons



Mammut Zephir Altitude Climbing Harness



Black Diamond Vapor Climbing Helmet

Please check that the set-up is secure on your boots and that the fastening strap is long enough. Do not cut or trim your crampon straps under any circumstances.

*We recommend the Petzl Vasak Leverlock Universel, Grivel G12 New-Matic and Black Diamond Sabretooth Clip Crampons.*

### Climbing Harness

Bring a lightweight alpine climbing harness. Your harness must have gear loops, adjustable leg loops and waistband large enough to fit over all your clothing layers. The waistband and leg loops should be able to completely separate. Do not bring a harness with fixed leg loops.

We strongly recommend newer models with a belay loop and buckles that do not require you to “doubling back” your waist belt.

*We recommend the Petzl Aquila or Altitude, Arc’Teryx AR-395A, Black Diamond Technician or Couloir, Blue Ice Choucas Pro, Edelrid Prisma Guide, or the Mammut Zephir Altitude Climbing Harnesses.*

### Climbing Helmet

Helmets designed for climbing are lightweight and designed to deflect falling ice and rocks. They also protect the head in a fall. All helmets must meet industry standards for impact protection and with the standard for overhead protection being greater than the side-protection standard.

There are two kinds of climbing helmets available today—hardshell helmets and shelled foam helmets. Helmet makers use different terms for each type of helmet, so focus instead on tell-tale construction details like shell hardness, foam thickness and the number of vents.

Plastic becomes brittle as it ages so ensure your helmet for the course is no more than 4 years old.

Check the size and make sure that it will adjust for when you are wearing your hat underneath.

*We recommend the Petzl Sirocco or Meteor, and the Black Diamond Vapor or Vector Climbing Helmets.*

### Belay Device

You will need to bring a belay device. We use tubular style units which have two holes for the rope to pass through. They are lightweight, easy to use and are compatible with single or double ropes.

*We recommend the Black Diamond ATC-XP or the Petzl Verso Belay Devices.*

### Locking Carabiners x 3

Bring 2 lightweight twist lock and 1 pear-shaped screw gate carabiners. Do not buy ball lock carabiners.

*We recommend the Petzl and Black Diamond Carabiners.*

### Ice Screw

This is very useful to secure yourself in steep icy ground.

*We recommend the Black Diamond Express Ice Screws.*



Petzl William Screw Gate Locking Carabiner



Beal 10mm Dyneema Sling



Black Diamond Expedition Ski Poles

## 120cm Sling

Bring along a 120cm sewn/tied length of sling.

*We recommend Beal, Black Diamond, Edelrid and Bluewater Sewn Slings.*

## Prusik x 1

A prusik is a friction hitch or knot used to attach a loop of cord around a rope. Prusiks are generally made from 6mm cord. You will need to bring 1 prusik on this trip - a short prusik made from 1.6m length of cord. Use a double or triple fisherman's knot to join the ends and create the loop.

## Collapsible Ski/Trekking Poles (Optional)

These are great for walking in deep snow or to save the knees on long days. Snow baskets are a worthy addition in deep snow.

*We recommend Leki and Black Diamond Trekking and Ski Poles.*

## TRAVEL GEAR

### Casual Wear

Bring a selection of casual clothes to wear on the inbetween days, when not in the mountains and at the end of the trip.

### Passports, Documents and Copies

You will be in at least two countries when around the Mont Blanc region.

**NOTE: If you found you have forgotten anything when you arrive in Chamonix, do not worry as there are plenty of stores that specialise in mountaineering equipment. Your guide will be happy to help you with any purchases you would like to make. If you have any questions, please ask.**