

Selecting Equipment

Physiotherapy in Comox for Cross Country Skiing

Welcome to Bodyworx Physiotherapy Pilates & Health's guide for selecting cross-country skiing gear.

We recommend a few general considerations for selecting your gear in order to stay comfortable and help minimize injury while skiing. A lot of gear is required for skiing, so if you only ski a couple of days per season, or you prefer not to cart excess luggage to your ski destination, or you are a beginner or want to try different gear before you buy, then renting ski gear is a good option. Nowadays, new season skis are often available for rent for a little extra cost, and ski technicians in the rental stores will be able to help you fit boots and get the right skis for your ability, your size and skiing plans.

Skis:



If you are a beginner, rent your skis for at least your first few outings. Your ski technician at the rental shop will help you select the right skis, boots and poles based on your body weight and height, skiing experience, weather and track conditions and plans for the day. Beginners will usually be fitted with waxless skis that are designed for a combination of classic skiing and skating. Make sure you know how to fasten your boots and get your feet (in the ski boots) in and out of the binding before you leave the rental shop.

There are four types of skis for cross-country skiing. Classic skis are for classic skiing - the traditional skiing style where skis move in a forward direction within tracks. Classic skis are curved to allow a glide forward without the waxed, ridged or scaled part of the ski sticking to the snow, and grips the snow during the "kick" phase of the skiing action. Skating skis are curved for a glide diagonally forward, gripping the snow for a forward motion without "skating" on these skis can be very difficult. High-performance (combination) skis can be used for either classic skiing or skating. Back-country or touring skis are typically shorter, wider and heavier than other cross-country skis and have full metal edges for traversing and descending hills.

If you prefer to purchase skis, you will probably still want to rent until you are familiar with the skis that suit you, and to try out different brands. Look out for shop demo days where you can test run new skis. If you are experienced and like to go fast, you will probably chose a ski that requires waxing. Waxing skis can become quite a science for competitive skiers. Don't forget to take your ski boots with you when purchasing skis, so that the bindings can be fitted and adjusted for you by the ski technician.

Ski poles:

Ski poles help you to maintain your balance and transfer power from your arms and upper body to help propel you forward on the snow. Generally speaking, skating poles are slightly longer (about nose to chin height) than classic poles (about shoulder height). If your ski poles are too short your balance may shift too far forward as you plant your poles in the snow for skiing. If your poles are too long, your balance may

shift too far backward increasing your chances of a fall.

Back-country or touring poles typically have larger baskets than other ski poles to prevent the poles being left behind in powder snow as you move your arms forward. Back-country poles may also be height-adjustable to suit skiing up, down or across hills.

If you are purchasing poles, you'll have already established the correct height pole by testing rental poles first. Lighter poles tend to be more expensive, but will really only make a noticeable difference in performance at an elite skiing level. Check for good quality, adjustable straps and grips that will help efficiently transfer arm and upper body power to the snow.

Ski Boots and bindings:

Ski boots should fit snugly all around the foot but without your toes touching the end of the boot. Loose boots will reduce your control over your skis. You may need to try on several different boots, different brands, or male and female models, to get a good fit and feel comfortable. Don't forget to wear your ski socks, when trying on new boots.

Boots differ for classic skiing and skating. Classic skiing boots are low cut, like running shoes, and are flexible in a forward plane to allow the foot to bend well for kicking. They provide lateral ankle stability. Skating ski boots are higher and stiffer to provide greater support to the ankle, especially at the sides of the ankle. Look after your boots and apply water proofing as required to keep your feet warm and dry.

Bindings must match boots.

Socks:

If you are a beginner and the skiing conditions are fine, any athletic sock that extends above your boot will do for cross-country skiing. Choose a sock that wicks moisture away from your skin. Wool is adequate, cotton is not a good choice.

If you ski often technical ski socks are a good investment. Ski socks are thin and made of material that wicks moisture away from your skin. For cold conditions, liner socks are available to use as a base layer. With a second sock layer on top, they provide extra foot insulation and help prevent blisters.

Goggles or sunglasses:

Whatever the weather, you'll need some kind of eye protection. Even on overcast days, you'll be exposed to UV light, not only from above, but also reflected from the snow. For skiing in mild conditions sunglasses with 100% UV protection are usually adequate. For colder conditions or in snow, wind or rain, goggles offer better eye protection. Select goggles with 100% UV protection.

Clothing:

You'll need three layers of clothing for cross-country skiing - a base layer such as thermal underwear or long running clothes (top and bottom), an insulating layer such as a wool, fleece, polypropylene or fibre-pile sweater, and a protective layer (top and bottom) that is wind and waterproof. If the weather is fine, you may wear only one or two of these layers, with the extra clothing taken with you in a back pack in case the weather conditions deteriorate. Weather conditions can change quickly and so can your body temperature - one minute you are hot from the exertion of skiing, the next minute you are cold in the wind taking a break.

Even in dry skiing conditions, beginners are likely to end up with more than your skis in the snow - making waterproof gear necessary at all times.

Ski jackets and pants are made from material that keeps water out and allows your skin to breathe. These outer garments are sometimes available for rent. Ski gear for alpine skiing and snow boarding is not usually appropriate since it tends to be too bulky for the freedom of movement required for cross-country skiing.

In fine, warm conditions you'll need a cap, and on cold or windy days you'll need a hat (toque or beanie). Select a hat made of fleece that covers your ears.

Gloves or mittens:

Ski gloves or mittens protect your hands during a fall and keep your hands warm. Select light, waterproof gloves or mittens that wick moisture away from your skin. Mittens and bulky gloves may take away some control over your poles and tend to overheat hands while skiing, but they are good to pack as spares if your gloves get wet or the weather turns cold.

Sun and wind protection:

Apply sunscreen and lip balm before you head outdoors for skiing. Keep sunscreen in your pocket to reapply as directed on the tube. In warm conditions wear a cap, rather than a toque or beanie.

Hydration

Keeping hydrated will help you stay alert while skiing, may help to prevent muscle cramps and will help your post ski recovery.

Pack drink bottles in your backpack, or for serious ski training you may choose a hydration pack. We recommend that you drink about 350-450 mL before you ski, and 250mL (1 cup) of water or sports drink every 20 minutes of skiing (ref: http://www.ausport.gov.au/sportscoachmag/nutrition2/pre-event_nutrition) and for one hour after you ski. Your fluid requirements will vary depending on the environmental conditions and your body size. To check that you are adequately hydrating, you can weigh yourself before and after you ski. If your weight remains the same then you are likely to be well hydrated.

Backpack

A backpack is likely to be useful to carry excess clothing, drinks and snacks. Backpacks with a padded back and padded, wide and adjustable straps including a hip or waist strap are best. Adjust the straps to keep the load close to your body and keep the load light so that it doesn't alter your balance significantly. Beginners may find a shelter to leave your backpack while you ski short distances from base.

Back-country skiers may need a larger backpack, such as a hiking day pack, to carry safety gear in addition to clothing, drinks and snacks.