

TECHNOLOGY & FEATURES



GORE-TEX built its reputation as the most durably waterproof technology available. That's because every product featuring Gore technology has been run through rigorous tests at every stage of the process. "The Martindale Test" and "The Cold Flex Test" are both mechanical applications that measure a fabric's durability and performance. The first involves rubbing wool or sandpaper against the fabric over and over again with considerable pressure. Depending on how tough the fabric needs to be, this vigorous rubbing continues, non-stop, for hours or even days. The latter involves squashing and stretching fabrics repeatedly in extreme temperatures for an extended period of time. If passed, our garments that use these fabrics are sent to Gore's "Rain Room," a sophisticated testing facility, designed to simulate a wide variety of rain conditions. Using specially engineered rain nozzles strategically positioned in the chamber, Gore tests a garment's waterproof ability in conditions that range from light drizzle to wind-driven rain. From there, it's put to The Comfort Test. Gore compares laboratory measurements with personal feelings of comfort from testers to ensure best possible comfort for a wide range of activities and conditions. Because lab tests are great, but only people can judge how products feel, work, and wear in different environments and activities. Building on this reputation, Gore has made a commitment to reduce its environmental footprint through the removal of PFC from its DWR treatment and increase of recycled and solution-dyed fabrics. Its recycled nylon is currently sourced from pre-consumer waste, while the recycled polyester stems from used PET bottles. As Gore continues their sustainable efforts, Mountain Hardwear users can expect to see even more of these options available within our line.

GORE-TEX PRO™ Gear made with 3-layer GORE-TEX PRO technology is designed for outdoor professionals in mind and made for serious enthusiasts who require the best weather protection available. As our athletes will tell you, when they're scaling exposed peaks and exiting the cover of trees, a cold wind or raging snow storm could drop body temps fast, putting them in serious danger. But under Gore's extremely rigorous testing standards, only the ultimate water- and wind-proofing are passed. This revolutionary multilayer membrane system bonds to a thin, low-denier microstructure—Gore Micro Grid Backer patented technology—to enhance breathability, reduce weight and internal abrasion, and resist snagging, creating the ultimate performance powerhouse you can count on in the most rugged conditions. So, if you really want to take it to the next level, be like the pros and go farther, longer, and harder than ever with GORE-TEX PRO.



GORE-TEX INFINIUM™ WINDSTOPPER® A nasty headwind or light shower can make you want to skip your morning jog, reach for the car keys over your commuter bike, or miss an evening meet-up with friends. But with outerwear made from GORE-TEX INFINIUM™ WINDSTOPPER®, you get a totally windproof, water-resistant, highly breathable defense system, protecting you where other jackets won't. Allow us to reiterate: not kind of windproof—not mostly wind-resistant—not works-here-but-not-there type of protection. We're talking don't-even-need-to-worry-about-it windproof. So, when an icy wind picks up and you're miles from home, you can keep on doing your thing, unphased.

GORE-TEX C-KNIT™ When tested, outerwear made with GORE-TEX C-KNIT™ Backer Technology increased breathability by up to 15% and weight was reduced by as much as 10%. Stats might not matter to every skier, snowboarder, or outdoor enthusiast, but what if we framed it this way: there's a 100% chance of fun levels increasing exponentially. You don't need a PhD to get behind that data. What does matter is the high range of mobility and protection during a hard day of riding or a wet day on the trail. Whatever your adventure, however hard you push yourself, count on being comfortable and warm and dry.

GORE-TEX ACTIVE Whether you're planning to skin up the backside of a mountain or hike three peaks before the sun sets, you need a jacket that is extremely breathable. GORE-TEX Active garments are designed for high-aerobic, done-in-a-day activities even in bad weather. They're lightweight, soft, and have excellent next-to-skin comfort. As well as being extremely breathable, packable, and lightweight, every jacket is guaranteed waterproof and windproof.

GORE-TEX PACLITE® Our garments made with GORE-TEX PACLITE® technology use a laminate construction where a special GORE-TEX membrane is bonded to the outer shell material and protected by a durable thin film on the inside instead of a backer. This two-layer design makes for an extremely lightweight and packable piece that you can take anywhere, no matter how tight space. So, when bad weather rolls in and sunshine turns to rain—whether you're halfway through your commute or just arriving at the trailhead—you can always be ready and confident that your rain shell, pants, or hat is durably waterproof, windproof, and extremely breathable.

GORE-TEX PACLITE® STRETCH You thought GORE-TEX PACLITE® technology was cool—PACLITE® STRETCH takes all the great capabilities we love and stretches them to your limit. Using a laminate construction where a special GORE-TEX membrane is bonded to the outer shell material and protected by a durable thin film on the inside instead of a backer, this two-layer design makes for an extremely lightweight and packable piece that you can move in freely. Not only can you can take these garments anywhere (no matter how tight space), when bad weather rolls in and sunshine turns to rain, you can always be ready and confident that your rain shell jacket or pants is durably waterproof, windproof, extremely breathable—and now, stretchable.

Even when you think it can't get any worse and moisture gets thrown into the mix, Gore made sure you can brush it off with ease. Water not only beads up and rolls off your shoulders when it's raining, sweat vapor easily escapes through its lightweight membrane when you're working hard. All that's left is a light, airy feeling to help you get to your destination scot-free.



Allied Down ensures the most responsibly-sourced and -processed down insulation available. It's bluesign® approved, which is a coveted mark given to companies who achieve optimal environmental performance and conduct regular audits in five key areas: resource productivity, consumer safety, air emissions, water emissions, and occupational health and safety. With quality control being paramount, Allied's down is considered the highest-caliber, cleanest, most allergen-free down available. Every ounce has about two million fluffy filaments that interlock and overlap to form a protective layer of non-conducting still air that keeps warmth in and cold out.



The Responsible Down Standard (RDS) ensures that down and feathers come from animals that have not been subjected to unnecessary harm. The RDS was developed and revised over three years, with the input of animal welfare groups, industry experts, brands and retailers. The standard recognizes and rewards the best practices in animal welfare. It is an independent, voluntary, global standard, which means that companies can choose to certify their products to the RDS, even if there is no legislation requiring them to do so. We at Mountain Hardwear value transparency so that you can make the most informed buying decisions possible and feel confident in your products.



Pertex® Y Fuse fabrics use yarns with unique Y-shaped filaments that create a tightly interlocking structure, which improves the downproof and water-beading properties of the fabric. This structure also means that Y Fuse fabrics remain highly stable over extended wear and washing, so no matter how hard your gear or garment is used and abused, its fabric retains its strength for the long haul.



When you wear a garment that utilizes **PrimaLoft insulation**, you can count on warmth without bulk, lightweight softness, water resistance, and the same compressibility and packability as goose down. That means that not only will your synthetic-insulated garment fit as comfortably on your body as it does in your pack, but in an unexpected storm in the backcountry, they'll continue to keep you warm and dry as you seek shelter. Originally developed to serve the needs of the U.S. Army, who desired a water-resistant alternative to down, PrimaLoft is recognized globally as the leader in synthetic insulation.



The first to knit, nap, and shear synthetic yarns into thermal fabric for outdoor apparel, **Polartec®s fleece** is engineered for long-lasting versatility. Premium polyester yarns are used for their hydrophobic properties to repel moisture and speed dry times. The lofted structures create thermal air pockets to retain warmth while still allowing optimal breathability. As the inventor of fabrics knit from upcycled plastic bottles, Polartec® is committed to reduce emissions and waste, while also meeting the standard for high-quality, sustainable textiles. By establishing higher-than-mandated protocols for water filtration, waste capture, and recycled content, Polartec® meets the highest possible standard of compliance and accountability.



Durability is essential for the use and abuse fabrics go through daily—abrasion, scuffs, tears—the threats are everywhere. We thoughtfully place durable **CORDURA® fabric** in key abrasion points so you can keep on doing your thing without worry. Whether it's climbing on sharp rock, a quick bike ride to meet friends after work, or just the ups and downs in office chairs, CORDURA® is hard on our daily wear. Designed for everyday comfort and built to last, CORDURA® fabric has proven performance in many of the world's toughest environments.



The patented **RECCO® technology** is a two-part rescue system that is integrated into all our advanced- to elite-level winter outerwear. The RECCO detector, carried by the rescuer, sends a signal to locate the RECCO reflector, carried by the user. The RECCO reflector in your jacket makes you searchable to the rescuers. They are lightweight passive transponders which require no power or activation to function and go unnoticed when worn. The RECCO detector emits a directional radar signal like the beam of a flashlight, so when the radar signal hits the RECCO reflector, it's echoed back to the detector and points the rescuer in the direction of the person in danger. The closer the detector gets to the reflector the stronger the returned-signal, ultimately allowing the rescuer to pinpoint the victim's location. RECCO reflectors are designed to last a lifetime and do not age or wear out—if not mechanically damaged they will last forever, so you can continue exploring the mountains without fear of failure from your rescue technology.



You can SPF all you want, but without UPF in your fabric, you might just end up with the kind of sunburn not even aloe can soothe. Our UPF-rated garments are made for long treks through exposed valleys when your shoulder straps have rubbed off the sunscreen even your sweat couldn't get and for those who agree that scalp burns are the worst burns. With sun-blocking technology built directly into the fibers of the fabric, you can trust that our UPF selections have you covered. We look for high-rating fabrics when designing for sun-soaked environments, so you can go out and do a lot of what you love to do. Because it may be true that, "too much of a good thing is bad for you," (like say, too much exposure and harmful UV rays), but UPF isn't one of them.



Dry.Q® Core garments are made for outdoor enthusiasts whose needs don't require the elite levels of performance offered by Dry.Q® Elite. Dry.Q® Core offers state-of-the-art waterproof technology with durability metrics that meet or exceed industry standards. We engineered each Dry.Q® Core fabric layer by layer, combining face and backing materials with different benefits to best meet the needs of the intended user, climate and activity.



Dry.Q® Active is used to meet the high-movement, high-breathability and low weight requirements of aerobic sports like running and skate skiing. The technology allows us to combine the waterproof protection of a hard shell with superlight and stretch fabrics. By engineering fabrics layer by layer and by combining performance fabrics in new ways, we can give athletes the protection of a rain-jacket with the lightweight stretch and moisture-management of a running top.



Thermal.Q® Elite is warmer because it's designed to mimic the structure of goose down – rigid stems that form a matrix of gaps and softer fibers to fill those gaps. Thermal.Q® Elite uses stiffer fibers to create a unique 3D grid structure and finer fibers to fill in the gaps the structure creates. The result is a warmer synthetic whose structure gives it better compression rebound.



Made for touchscreen connectivity without removing your gloves, **Stimulus technology** allows you to text your friends when you're lost on the mountain and the lift is nowhere in sight. (We've all been there.) Don't let the sub-zero temps of the back bowls wreak havoc on your digits—comfortably operate your technology of choice and get back on track safely.