DYNEEMA® WOVEN COMPOSITES:

BEGINNING A NEW ERA OF ADVENTURE WITH DYNEEMA® AND HYPERLITE MOUNTAIN GEAR









WHERE THE WILD PUSHES LIMITS, SO DO WE

Adventure is where natural thrills meet human grit. People can only survive – and thrive – in the wild by respecting its power, then applying every fiber of ingenuity to the challenges they face.

This mindset has always guided Dyneema® in the great outdoors, inspiring innovations that help brands craft high-performance gear built to go the distance.

For over 15 years, Dyneema® composites have been trusted by elite adventurers tackling the longest trails and toughest terrains imaginable. Ultralight, exceedingly strong and fully waterproof, these materials empower product designers to craft superior backpacks, tents, performance footwear, and wind sports equipment. Now, after two years of extensive R&D and testing, we've done what seemed impossible – improved the performance attributes of the world's strongest fiber™.

The result? A brand-new Dyneema® composite material: one that doubles down on the core durability, strength, abrasion resistance, and dimensional stability of the long-trusted Dyneema® fiber.

Meet: Dyneema® Woven Composite.

DOUBLE THE DYNEEMA®

To create Dyneema® Woven Composites, we begin with our trademark Dyneema® core, created by layering and bonding Dyneema® fibers at 0° and 90° orientation, preventing the individual fibers from shifting and ensuring long-lasting shape retention. We then use more Dyneema® fibers to craft a lightweight woven fabric, which in turn is bonded to the original Dyneema® core.

In other words, we're using the world's strongest fiber™ on both the internal and external layers of our latest composite material – and literally doubling the Dyneema®. This dual-layer composite structure unlocks multiple performance benefits. Primarily, the woven Dyneema® face fabric enables exceedingly high strength, abrasion resistance, and durability. This is combined with the dimensional stability, structural integrity, and lightweight waterproof properties of our Dyneema® composite technology. The result is a highly durable composite, even under significant load conditions and prolonged use.



PERFECT FOR TRAILS, BUILT NEVER TO FAIL

Dyneema[®] Woven Composites are engineered with multiple built-in technical advantages, including:





Superior abrasion resistance -Withstands friction, rough surfaces, and repeated use





Outstanding durability -

utilizes the strength of Dyneema® in both the internal and external layers, eliminating crimp and delivering long-lasting performance



All these qualities – and more – abound in the first-ever Dyneema[®] Woven Composites consumer product. A backpack made by adventurers, for adventurers.

Unrivaled structural integrity -

Resists continuous bending, stretching, and impact while maintaining its structural integrity

HYPERLITE MOUNTAIN GEAR CORE PACKS: THE ICONS GET AN ELEVATED MAKEOVER

When Hyperlite's design expertise meets the unrivaled material qualities of Dyneema® Woven Composites, the result is a generation-defining backpack.

Not just one backpack, in fact, but three. Harnessing the power of Dyneema® Woven Composites, Hyperlite has updated its iconic Windrider, Southwest, and Junction packs for the first time since their original 2010 launch. The result of this collaboration? The best gets even better, with Hyperlite further improving gear that's already proven itself on the world's most iconic trails.

The new packs are significantly more durable under heavy load conditions and prolonged use – all while retaining the ultra-lightweight performance that defines Hyperlite gear.



THE BEST JUST GOT BETTER

The iconic Windrider, Southwest, and Junction packs now feature Dyneema® Woven Composites for:

- \bigcirc Enhanced carry comfort and fit geometry
- \bigcirc Better hand feel and a more rugged appearance
- \bigcirc Quieter noise levels and fewer crinkles in low temperatures
- \bigcirc Improved storage access, convenience, and security

These new features build on everything that made earlier Hyperlite packs the ultimate adventure companion—fully waterproof, compact, and easy to pack, and powered by the unmatched strength-to-weight ratio of the world's strongest fiber™.



PUSHED TO THE LIMITS

Every Dyneema® composite undergoes rigorous laboratory testing to ensure it meets the highest standards for strength, durability, and performance.

Our in-house laboratories conduct:

- \bigcirc Tensile testing
- \bigcirc Tear testing
- \bigcirc Puncture testing
- \bigcirc Peel strength testing
- \bigcirc Taber abrasion testing
- \bigcirc Hydrostatic head testing
- \bigcirc Precision microscopy

For Dyneema® Woven Composites, an even wider series of tests were deployed, including the Gelbo Flex test (typically used for aerospace and aerostat inflatables), and extensive cut testing in our technical centers.

So you know our latest composite has really been put through its paces, ensuring a material innovation as strong as it is durable.



BEYOND WHAT LABS CAN MEASURE

At Dyneema® we understand that our solutions – and the products they inspire – need to prove themselves in the real world. That's why the new Hyperlite packs have been tested by toplevel athletes and adventurers around the world.

Going beyond what labs can measure, Hyperlite then put Dyneema® Woven Composites to the test where it matters most: in the wild. The new packs have proven their worth over thousands of hours of real-world trials – from the summit of the Rockies to the Alaskan wilderness and the Grand Canyon. In the lab and beyond, every test confirms the same, crucial fact: Dyeema® Woven Composites strike the ideal balance of weight, durability, and water resistance— built for a new generation of backpacks and a new era of adventure.



FURTHER INFORMATION



Check out **HyperliteMountainGear.com** now to learn more.



Or explore the full range of Dyneema® composites at **Dyneema.com/Fabric-Finder**

#BetterBackpacking



@thedyneemaproject
@hyperlite_mountain_gear

Media contact:

rekha@cornershopcomms.com

