



## Weezle Undersuit Technical Specification



A Nylon based material manufactured in the United Kingdom to Weezle Specifications with a unique ability to manage moisture. Each square metre of Paratex used is made of 12,000 continuous bundles of fine yarn, with each bundle containing 34 strands each strand 10 times finer than a human hair. The gaps between these strands are small enough to block water droplets but large enough to allow moisture vapour out. The small channels (capillaries) between the strands draw moisture to the exterior where it spreads over a large surface area for speedy evaporation. It's construction also means it is relatively wind proof and has high stability in alkali & acids down to ph. 4.0, below which it's integrity will be affected.

Paratex is treated with unique, durable DWR waterproofing. The DWR encapsulates each filament with a hydrophobic polymer. This treatment does not affect breathability, and Paratex has a CLO of 0.1.



A synthetic (Polyester) filling produced for Weezle in Switzerland, made to mimic natural insulation. The fibres are straight, crimped & curled so resembling down in its structure and performance. This also results in it being very washable and hydrophobic so allows water and vapour to pass through to the outer layer rather than holding it in the filling, with a PET of less than 0.4%. This enables the Weezle to dry quickly and keep the wearer dry in damp conditions.

Thermal properties vary with this layer alone varies with CLO from 1.1 to 4.2 dependant on the Weezle chosen. The Softie is resistant to mildew, oil acid (to hydrochloric acid 20%) & medium resistant to alkali substances.



Made in the United Kingdom, the lining material we call TS1 is sueded polyester, using fibres of varying thickness. Micro fibre; 1 decitex on the outside and Macrofibre; 3 decitex on the inside, producing a similar feel to suede. Water will always move from a low to high surface area, thus moving water (or sweat) from the interior to the exterior. The polyester is also highly breathable and has reflective heat properties, even when wet.

The soft short pile also traps air and body heat within its fibres. The physical properties and resistance to oil, acid and alkali are similar to that of Softie filing and is also easily washable and easy to dry.

The lining also has reflective properties so body heat is retained, reducing the need for reliance on trapped air for warmth and therefore working well when wet, such as in a full suit flood.