# HEIQ COOL Dual action cooling

# STARTS COOL, STAYS COOL

HeiQ Cool is the world's first textile technology to deliver both instant contact cooling and continuous evaporative cooling for optimal well-being day and night. It cools before the first sign of sweat, delays the build-up of heat and continuously regulates the temperature. Instantly cool to the touch, the components synergistically recharge the surface layer ensuring a consistently cool, dry and comfortable climate around the body.

FOR TEXTILE



### **Outstanding qualities**

- Revolutionary dual action: instant & continuous cooling
- Up to 3°C/5.4°F cooler fabric temperature
- Enhancing thermal & moisture comfort
- Contains >50% biobased content
- Based on a patented formulation

#### **Added value**

- Gives consumers a tangible cooling sensation at point of sale
- Maintains excellent hand-feel and hydrophilicity
- Exceptional cooling performance for the lifetime of the textile product
- Flexible finishing possibilities: Pad, Foam coating or Print

#### Wide-ranging applications

- Applicable to work on any fiber type: natural, synthetics and blends
- For home textiles and apparel

#### **Standards**

- USDA certified biobased products
- OEKO-TEX<sup>®</sup> suited
- Meets most brand RSL requirements

### WHAT DOES IT DO?

HeiQ Cool imparts fabrics with a dual cooling capability for optimal comfort. Melting energy absorption delivers instant contact cooling before the first sign of sweat and delays the build-up of heat. The vaporizing energy action mimics the skin's thermal regulating system by providing continuous evaporative cooling as long as the body is hot and sweaty.

## WHAT IS IT FOR?

HeiQ Cool is especially suitable for home textiles such as bed linen, sheets and accessories as well as mattress ticking and memory foam products. It is also designed for apparel, particularly fabrics that are within close reach of body heat.

#### WORLD'S FIRST DUAL ACTION COOLING TEXTILE TECHNOLOGY

**Starts cool:** Cooling starts when the body is hot. The biobased vegetable oil-derived thermo-functional polymer absorbs heat energy, giving an instant cooling sensation.

**Stays cool:** If the body continues to heat up, perspiration is generated and the patented hydro-functional polymer transports moisture away together with the heat, creating a continuous cooling effect that stops once cooling is complete.

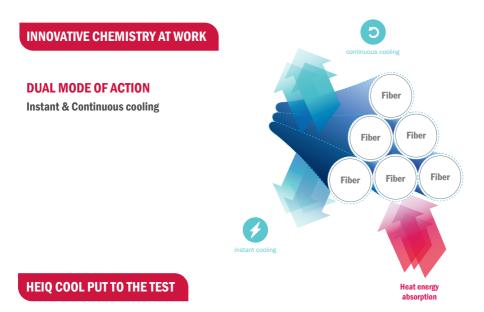




# Melting energy absorption action

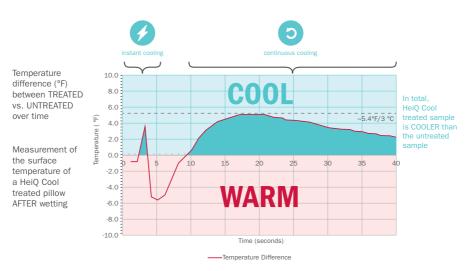
Vaporizing energy action

|                  | action   |   |
|------------------|--|---|
| Effect           | Instant contact cooling  | Continuous evaporative cooling                                    |
| Characteristics  | Cooling independent from<br>moisture   | Closely mimics the skin's natural sweat thermal regulating system |
| Consumer benefit | Cools you even <b>before the first</b><br><b>sign</b> of sweat on fabric, delay-<br>ing build up of heat and sweat | Continuous cooling for as long as you are<br>hot and sweaty       |
| Basis            | <b>Biobased</b> vegetable oil-derived thermo-functional polymer  | Patented hydro-functional polymer                                 |



Over time, HeiQ Cool treated fabrics provide in total a cooler sensation compared to an untreated fabric sample – initially and continuously.

#### **COOLING POTENTIAL OF HEIQ COOL TREATED FABRICS**





# Sustainable technology for dual action cooling

HeiQ adheres to the highest standards of sustainability and HeiQ Cool is no exception.

- HeiQ Cool products contain more than 50% USDA certified biobased content
- Combination of a patented hydrofunctional polymer with a biobased vegetable oil-derived thermofunctional polymer
- Saves time in the drying process during application compared to standard PCM (Phase-Change-Material) solutions
- OEKO-TEX<sup>®</sup> suited









HEIQ **Differentiate.** 

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## Get inspired and learn more about our innovative technologies info@heig.com

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For more details and references please ask for our HeiO Cool Technical presentation