



## The cost-effective alternative

### **NAME OF PRODUCT:**

VISMED® LIGHT  
Lubricant eye drops

### **INSTRUCTIONS:**

Symptoms and signs of dry eye and/or ocular surface damage, due to diseases such as superficial keratitis, Sjögren syndrome or primary dry eye syndrome. For lubrication of the eyes in case of sensation of dryness, burning and ocular fatigue and other minor complaints of no pathological significance induced, for example, by dust, smoke, dry heat, air conditioning, wind, cold, extended computer screen use or contact lens wear (rigid or soft).

### **COMPOSITION:**

#### **Active ingredient:**

Sodium hyaluronate from fermentation 0.1%

#### **Excipients:**

Sodium chloride, potassium chloride, sodium citrate, disodium phosphate, magnesium chloride, calcium chloride, sodium dihydrogen phosphate, water for injections, disodium edetate and polyhexanide as preservatives. The solution is hypotonic (150 mOsm/l) and adjusted to pH 7.3.

### **PRESENTATION:**

Multidose containers of 5 ml and 15 ml containing 0.1% sodium hyaluronate for topical ophthalmic use.

### **DOSAGE AND ADMINISTRATION:**

Before using for the first time turn the cap anticlockwise until the safety ring snaps. Twist off the screw cap and position the tip of the container above the eye to be treated: upon slight pressure, VISMED® LIGHT will easily flow out from the container. If not otherwise recommended, place one or two drops of VISMED® LIGHT into the conjunctival sac of the eye as often as needed. After blinking, the solution will disperse and form a transparent and long-lasting coating on the surface of the eye. VISMED® LIGHT may also be used while wearing contact lenses (rigid or soft). Solution from the open container may be used up to three months.

### **CHARACTERISTICS AND MODE OF ACTION:**

VISMED® LIGHT contains a highly purified specific fraction of sodium salt of hyaluronic acid produced by bacterial fermentation and is therefore free from animal proteins. Hyaluronic acid is a natural polymer, which is present throughout the human body and also in the structures of human eyes. Its main physical characteristic is viscoelasticity. This means that VISMED® LIGHT has a high viscosity between blinks and a low viscosity during blinking, ensuring efficient coating of the surface of the eye.<sup>1,2</sup>

Hyaluronic acid also possesses mucoadhesive properties<sup>3</sup> and the ability to entrap water<sup>4</sup>, thus resembling tear mucus glycoprotein<sup>2</sup>. VISMED® LIGHT has been carefully formulated to have the required concentration of hyaluronic acid (0.1%), shown to be efficacious in relieving sensations of ocular dryness.<sup>5</sup>





The core mechanisms of dry eye are driven by tear hyperosmolarity and tear film instability.<sup>6</sup> The hypotonic solution VISMED® LIGHT (150 mOsm/l) counteracts the hyperosmolarity of altered tear fluid thus limiting corneal damage.<sup>7</sup>

VISMED® LIGHT has a uniquely patented formulation that contains the essential ions calcium, magnesium and potassium found in natural tears and important to maintain healthy structure and function of the cornea.<sup>8,9</sup>

The preservative in VISMED® LIGHT has been carefully balanced to be non-cytotoxic while keeping the solution sterile.<sup>10</sup>

VISMED® LIGHT offers an effective combination of long-lasting protection, symptomatic relief and comfort by increasing the tear film break-up time<sup>11</sup>, due to its increased residence time<sup>12</sup>, and the coating ability due to its low contact angle. Therefore VISMED® LIGHT is particularly indicated for all types of contact lens wearers.

#### **BIOCOMPATIBILITY:**

Results of acute, sub-acute and chronic toxicity studies together with the results of the foetal toxicity, fertility, peri- and post-natal toxicity studies show that hyaluronic acid is very well tolerated.<sup>13,14</sup> In addition, animal studies show that repeated topical ocular administration of hyaluronic acid is also well tolerated.<sup>10</sup>

#### **INTERACTIONS:**

Do not use VISMED® LIGHT at the same time as any other drug or product applied to the eye since it may modify their effects.

#### **STORAGE:**

Store between 2°C and 25°C.

#### **SHELF-LIFE:**

2 years if stored in original packaging.

#### **PACKAGING:**

VISMED® LIGHT is presented in preserved, multidose containers of 5 ml and 15 ml.

#### **REFERENCES:**

1. Bron AJ. *Trans Ophthalmol Soc UK* 1985; 104: 801–826.
2. Tiffany JM. *Adv Exp Med Biol* 1994; 350: 231–8.
3. Saettone MF et al. *Int J Pharm* 1989; 51: 203–12.
4. Balazs EA. *Cosmetics Toiletries* 1984; 99: 65–72.
5. Hamano T et al. *Jpn J Ophthalmol* 1996; 40: 62–5.
6. *The Ocular Surface DEWS Definition and Classification* 2007; 5(2): 75–92.
7. Gilbard JP, Kenyon KR. *Ophthalmology* 1985; 92: 646–50.
8. Reddy IK et al. In: Reddy K (ed) *Ocular therapeutics and drug delivery. A multidisciplinary approach* Basel: Technomic Publications, 1996: 171–211.
9. Green K et al. *Ophthalmic Res* 1992; 24: 99–102.
10. TRB Chemedica: Data on file.
11. Johnson ME et al. *Graefes Arch Clin Exp Ophthalmol* 2006; 244: 109–12.
12. Gurny R et al. *Graefes Arch Clin Exp Ophthalmol* 1990; 228: 510–2.
13. Nozaki Y et al. *Jpn Pharmacol Ther* 1993; 21: 87–102.
14. Sawa M et al. *J Jpn Ophthalmol* 1993; 97: 448–54.