

## Physician FAQ

### Q: What is a typical serum tears concentration?

Nationally, about 75-80% of chronic dry-eye sufferers find relief at a 20-30% concentration level with a typical dosage of 4 drops/eye/day. Commonly, serum concentrations are titrated to effect when a lower serum concentration is not deemed to be adequate.

In a 2014 study published by the National Library of Medicine (NIH), National Center for Biotechnology Information: (<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4130192/>)

- 50% concentration drops were used due to the extra viscosity patients experienced compared to lower concentrations and enabled a good experience/trial without having to draw as much blood as a higher concentration.
- All patients using serum tears experienced improvement in all areas while having no adverse side effects.
- Patient eye conditions included: neurotrophic keratopathy, keratoconjunctivitis sicca not Sjögren, and keratoconjunctivitis sicca, Sjögren-related.

### Q: How do serum tears compare to natural tears?

Components	Natural Tears	Serum Tears	References
<b>pH</b>	7.4	7.4	Tsubota et al. (1999b), Geerling et al. (2004, Lopez Garcia & del Castillo (2011) and Pan et al. (2013)
<b>Osmolarity</b>	298	296	
<b>EGF (ng/ml)</b>	0.2-0.3 1.9-9.7	0.5	
<b>TGF-β (ng/ml)</b>	2-10	6-33	
<b>Vit A (mg/ml)</b>	0.02	46	
<b>Fibronectin (μg/ml)</b>	21	205	
<b>Lysozyme (mg/ml)</b>	1.4	6	
<b>SlgA (μg/ml)</b>	1190	2	
<b>IGF-I (ng/ml)</b>	157		
<b>SP (ng/ml)</b>	0.157	0.071	
<b>NGF (pg/ml)</b>	468	54	

**EGF = epidermal growth factor, TGF-B = transforming growth factor beta, SlgA – surface immunoglobulin A, IGF-I = insulin-like growth factor I, SP = substance P, NGF – nerve growth factor.**

### Q: What eye conditions benefit from the use of serum tears?

Serum tears have been found to be effective for:

- Stage 2 Dry Eye Disease and beyond
- Neurotrophic keratopathy
- Persistent epithelial defects
- Exposure keratopathy
- Pre/post-surgical
- Glaucoma medication side effects

**Q: How do my patients get their blood drawn by ARCpoint Labs?**

ARCpoint Labs can provide a “requisition pad” with prescribing information to simplify the prescription process and provide patient instructions on how to arrange for their serum tears to be made.

**Q: How would I write the prescription?**

ARCpoint Labs can provide custom requisition pads with all the required information for our team to handle this for your patients.

**Q: How much will this cost my patients?**

Most insurance companies do not cover serum tears; however, patients can use FSA/HSA plans to pay for their drops. In addition to this, ARCpoint Labs can provide a detailed receipt for patients to send to their insurance company for potential reimbursement.

**Q: How long does each prescription last?**

A kit of 60 mL of drops typically lasts patients 5-6 months – 4 drops/eye/day. The 60 mL are divided up into 12 - 5 ml bottles. Each bottle typically lasts 12-15 days. A kit of 40 mL of drops typically lasts a patient 3-4 months.

**Q: How well are serum tears tolerated?**

Serum tears are well tolerated by patients. As an example, unlike prescription or over-the-counter options, there are no drug side effects. Likewise, the probability of clinical effectiveness is high with serum tears processed by ARCpoint Labs, which provides a dramatic reduction in comparative costs.

**Q: Do serum tears interact negatively with other treatments or prescriptions?**

There are no known negative interactions with other treatments of prescriptions.