to intermediate focus and from intermediate to near.

CLINICAL RESULTS

A prospective European multicenter study of the Precizon enrolled 60 patients who were scheduled for either cataract surgery or refractive lens exchange.[1] At 3 months postoperative, 80% of patients reported achieving spectacle independence. Patients also had good UCVA for near, intermediate, and distance vision. The majority of patients had no complaints of halos or glare at night; about 5% reported a variety of visual disturbances at night during the first 3 months of follow-up.

At my center, we enrolled 20 patients in the study. At 3 months postoperative, 100% of patients were within ±0.50 D of sphere target, and 87.5% were within ±0.50 D of their cylinder correction target. Further, 37.5% were within ±0.25 D of sphere and 37.5% were within ±0.25 D of cylinder correction targets.

CONCLUSION

The Precizon CTF IOL represents a new paradigm in lens-based presbyopia correction procedures. With its anterior surface segmental design, the lens provides excellent far and near vision with a smooth transition between zones, in essence creating a constant progressive focus between focal points. Because the Precizon CTF mimics the eye's natural process of accommodation, patients should experience only a brief period of neural adaptation. As with any IOL, patient selection is crucial with the Precizon CTF.

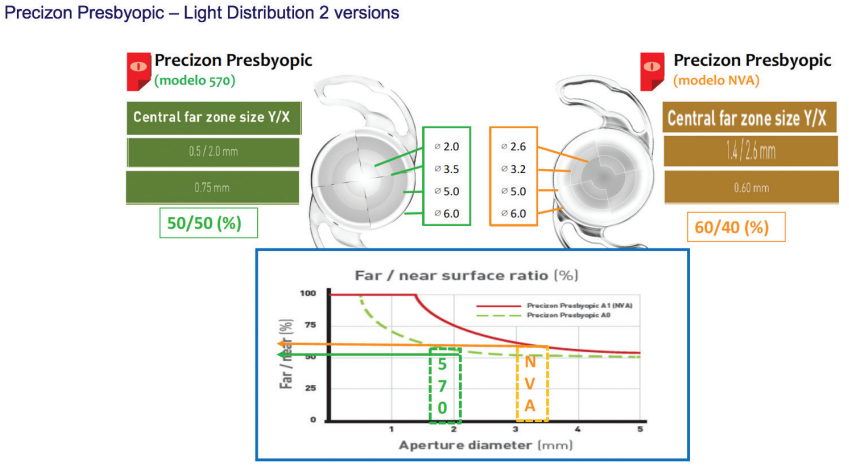

Figure 14. The Precizon CTF is available in two models.

1. Holzer M. Functional outcomes and patient satisfaction of the new Precizon presbyopic multifocal intraocular lens. Paper presented at: the European Society of Cataract and Refractive Surgeons Annual Meeting; October 7-11, 2017; Lisbon, Portugal.

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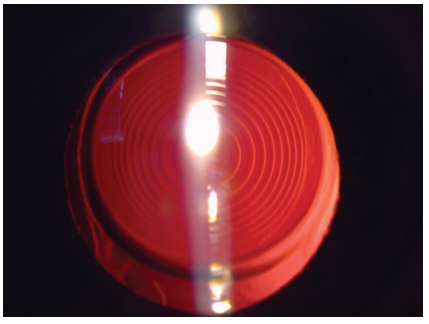
RAYONE TRIFOCAL TORIC

A new IOL that checks all the boxes.

I am always keen to add a new presbyopia-correcting IOL to my repertoire in the never-ending quest to improve patient outcomes and satisfaction. When considering a new lens, I look for several features:

- An established manufacturer;
- A lens material with a proven track record;
- A lens platform already demonstrated to be safe and effective;
- Excellent visual performance;
- An option to have the IOL preloaded;
- A microincision push injector for the IOL that supports a wound-assisted technique;
- Low incidence and severity of glare and halos;
- Low incidence of posterior capsular opacification; and
- For a toric IOL, a wide cylinder range and rotational stability.

I was therefore more than happy to participate in a multicenter evaluation of the RayOne Trifocal Toric IOL (Rayner; Figure 15) prior to its formal



Figures 15 and 16 courtesy of Amir Hamid, BMedSci, BMBS, FRCOphth, CERTLRS

Figure 15. A well-centered RayOne Trifocal Toric IOL seen with retroillumination.

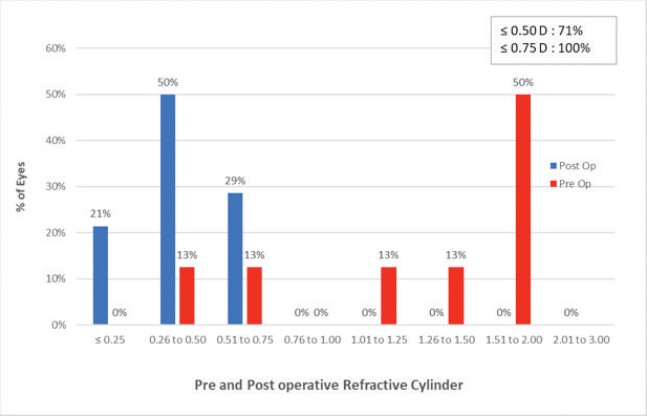


Figure 16. Pre- and postoperative refractive cylinder with the RayOne Trifocal in 20 eyes of 10 patients.

global launch at ESCRS Paris 2019. When I was presented with the specifications of the IOL, I was reassured to see that they fulfilled all my requirements.

This multicenter pilot study involved five sites and five surgeons in Germany, the United Kingdom, and Japan. Patients with bilateral visually significant cataract and no ocular comorbidity were enrolled after fully informed consent was obtained. After bilateral IOL implantation, the primary endpoints of the study were visual acuity, subjective refraction, cylinder reduction, and surgeon satisfaction at 3 months postoperative. The results of 20 eyes of 10 patients were available for analysis.[1]

RESULTS

Figure 16 summarizes the results. All patients were within ±0.50 D and 57% were within ±0.25 D of emmetropia. Regarding astigmatism correction, 100% of eyes had 0.75 D or less of astigmatism postoperatively, and 71% had 0.50 D or less.

More important, 90% of patients achieved monocular and binocular uncorrected distance, intermediate, and near visual acuity of 0.1 logMAR or better (Table). And finally, all surgeons reported high levels of satisfaction with the lens and its injector system.

TABLE. MONOCULAR AND BINOCULAR LOGMAR VISUAL ACUITY AT DISTANCE, INTERMEDIATE, AND NEAR

Monocular and binocular logMAR distance visual acuities		
Visual Acuity	**Monocular**	**Binocular**
UDVA		
Mean ±SD	0.04 ±0.10	0.00 ±0.09
Range	-0.10 ±0.30	-0.10 ±0.20
UIVA		
Mean ±SD	0.01 ±0.05	-0.03 ±0.05
Range	-0.10 ±0.10	-0.10 ±0.10
UNVA		
Mean ±SD	0.09 ±0.12	0.05 ±0.05
Range	-0.10 ±0.20	-0.10 ±0.18

D, diopters; SD, standard deviation; UDVA, uncorrected distance visual acuity; UIVA, uncorrected intermediate visual acuity; UNVA, uncorrected near visual acuity

CONCLUSION

The RayOne Trifocal Toric IOL is a promising new entry in the presbyopia-correcting toric IOL category for surgeons. Initial results were excellent, with high levels of satisfaction among both patients and surgeons. Additionally, the RayPro digital platform (Rayner) for collecting patient-reported outcomes allows surgeons to continuously monitor long-term outcomes and satisfaction among our patients implanted with this and other presbyopia-correcting IOLs.

1. Barsam A, Butt A, Thomson P. First visual results after implantation of the RayOne trifocal intraocular lens. Poster presented at: the 24th ESCRS Winter Meeting; February 21-23, 2020; Marrakech, Morocco.

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EDOF TREATMENT WITH THE LIGHT ADJUSTABLE LENS

In clinical trials of the Light Adjustable Lens (RxSight), investigators reported excellent results with this first-of-its-kind IOL, including reduction in treated astigmatism, excellent UCVA, and a sharp reduction in residual spherical error.[1]

In the initial iteration of the procedure, the Light Adjustable Lens could be treated postoperatively with the Light Delivery Device (RxSight) to adjust sphere and cylinder. Now, European surgeons have gained access to an extended depth of focus (EDOF) treatment for the Light Adjustable Lens. This treatment modality is also already approved in Mexico, according to Market Scope.[2]

RxSight has demonstrated the EDOF adjustability in 18 patients who underwent bilateral implantation of the Light Adjustable Lens. All were given EDOF adjustments, and all achieved uncorrected distance and intermediate visual acuities of 20/20 or better and uncorrected near visual acuities of 20/25 or better.[2]

1. FDA approves first implanted lens that can be adjusted after cataract surgery to improve vision without eyeglasses in some patients [press release]. US Food and Drug Administration. November 22, 2017. https://www.fda.gov/news-events/press-announcements/fda-approves-first-implanted-lens-can-be-adjusted-after-cataract-surgery-improve-vision-without. Accessed March 19, 2020.
2. RxSight begins initial commercialization of Light Adjustable Lens in the US. *Market Scope Ophthalmic Market Perspectives*. September 26, 2019. https://www.rxsight.com/media/rjrbad2g/marketscope_2019_sep_26.pdf. Accessed March 19, 2020.