Effects of multiple intravitreal anti–VEGF injections on retinal nerve fiber layer and intraocular pressure: a comparative clinical study

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Dear Sir,

I found the article by Sobaci et al.[1] very interesting.

The authors concluded that repeated intravitreal injection (IVI) of ranibizumab or bevacizumab didn't seem have adverse effects on retinal nerve fiber layer (RNFL) thickness in wet age-related macular degeneration (AMD) patients. But, they performed sequential RNFL thickness analysis with optical coherence tomography (OCT) (Stratus™, Carl Zeiss Meditec AG, Jena, Germany) using an automated computer algorithm (Fast RNFL). However, this measuring instrument is a time-domain OCT (TD-OCT) and so has an 8 to 10 μm resolution, in contrast with the gold-standard technology: the spectral-domain OCT (SD-OCT). This one has a much higher scan speed than TD-OCT, provides better scan resolution (4-5 μm) and allows for a greater number of scans than TD technology[2].

SD-OCT has a better reproducibility of measures because its softwares minimize variation and improve the power to detect small-thickness changes in the RNFL, and one of them use an eye tracker technology permitting a perfect reproducibility of scan location during the follow-up.

Anyway, this kind of technology is used by Martinez-de-la-Casa et al. [3] who concluded in their article, that a significant RNFL thinning (5, 6 μm) occurred in eyes treated by intravitreal ranibizumab after 12mo of follow-up.

So, it could be interesting to assess RNFL thickness during a longer time and a larger group of patients in order to conclude definitively on effect of IVI on this parameter.

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REFERENCES

