



In clinical practice, anterior segment OCT cannot replace gonioscopy as a method of examining the filtration angle

The Science behind the Tip

The diagnosis and management of all types of glaucoma is dependent on the accurate evaluation of the angle and its structures. Dynamic gonioscopy is essential in distinguishing the various degrees of angle closure.

In the past few years anterior segment OCT (AS OCT) has become popular, as it provides non-contact examination of the angle and quantitative measurement of the various structures¹. This biomechanical analysis is useful for scientific purposes, but provides limited information in the individual patient. Disadvantages of this technology include: an inability to identify the scleral spur (which is an essential landmark for the interpretation of the examination) in approximately 25% of AC OCT images and an inability to perform a dynamic examination, because the scan is undertaken in only one plane/axis².

When AS OCT is used for screening for primary angle closure, the test does not achieve the combination for specificity and sensitivity needed³. In the setting of an ophthalmic clinic, gonioscopy remains the best method of detecting these patients.

References

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- 3) Zhang Y, Li SZ, Li L et al. The Handan Eye Study: Comparison of screening methods for primary angle closure suspects in a rural Chinese population. *Ophthalmic Epidemiol* 2014;21: 268-75