At Issue: reasons for use of one microkeratome over any other



At Issue posed the following question to a panel of experts: "What is the reason why you use the microkeratome you use over any other?"

LSK Evolution with LSK Classic One head

Noel A. Alpins, MD, FACS: My favored choice of microkeratome is the Moria (Antony, France) LSK Evolution unit with the manual LSK Classic One head. I have now used it for 3 years and have used others at varying times. Its advantages lie in its simplicity and reproducibility in operation. The learning curve was longer and flatter than the automated devices, but once mastered, it has significant advantages.

It is extremely adaptable to any shaped or sized lid aperture or depth of orbit, as it requires little space and the head moves along a protected track unimpeded by adjacent tissues. The forward motion of the head requires some skill to keep the movement speed consistent to provide an even and smooth surface, but incomplete flaps do not occur, as there is no mechanical component that can fail or become obstructed.

Choosing a vacuum ring profile that

matches the keratometry and corneal diameter can vary the size of the flap and, as a consequence, suction is consistent and adequate with good thickness flaps. A buttonhole is a rare event. Striae are not common when combined with a flap applanator at the end of the procedure. Nasal hinges have not been a disadvantage, and only one case of diffuse lamellar keratitis has been experienced in over 3,000 eyes.

Epithelial disturbance from the passage of the head is very uncommon, and epithelial ingrowth of any significance that requires treatment is rare. The setup routine for the microkeratome is simple and quick, and maintenance costs and down time are low.

Sometimes the edge of the flap shows some irregularity and the bed may not be altogether smooth if speed of movement of the head has varied, but these disadvantages are small when balanced against the advantages outlined and the disadvantages inherent in other units.

Noel A. Alpins, MD, FACS, can be reached at NewVision Clinics, 7 Chesterville Road, Cheltenham Vic. 3192, Australia; (61) 3-9584-6122; fax: (61) 3-9585-0995; email: alpins@newvisionclinics.com.au. Dr. Alpins has no direct financial



interest in any of the products mentioned in this article, nor is he a paid consultant for any companies mentioned.