

Second-line therapy following latanoprost failure

Latanoprost is commonly prescribed as first line monotherapy for the management of POAG in the USA and Europe. However, second line therapy in patients not fully controlled with latanoprost is controversial. Konstas *et al* evaluated efficacy and safety of switching patients who failed latanoprost monotherapy to dorzolamide/timolol (DTFC) or latanoprost/timolol fixed combination (LTFC) or adding DTFC in a prospective, randomised, observer-masked, placebo-controlled, crossover, comparison study. After 3 months, patients were then crossed over to the next treatment. All three adjunctive therapies significantly decreased the IOP compared with latanoprost alone, but the addition of DTFC to latanoprost caused the greatest IOP reduction. *See page 1498*

23-gauge versus 20-gauge system for vitrectomy

Wimpissinger *et al* performed a prospective randomised controlled trial on 60 patients undergoing pars plana vitrectomy with either 23- or 20-gauge instruments. Conjunctival injection and postoperative pain were significantly reduced in the 23-gauge vitrectomy group. Opening and closure times were significantly shorter and vitrectomy time significantly longer in the 23-gauge system compared with 20-gauge vitrectomy. However, overall surgery times did not differ significantly between both groups. The authors conclude that the time of surgery is almost equal—a shorter time for wound closure is neutralised by a longer vitrectomy time in the 23-gauge group. *See page 1483*

AMD assessed with 3D Fourier-domain OCT

Fourier-domain (FD) OCT provides increased scan resolution, scanning speed,

and generates three-dimensional (3D) OCT images. Menke *et al* demonstrated features of AMD assessed with 3D FD-OCT (Topcon 3D-OCT1000) in 5 patients with typical morphological changes on funduscopy. In addition to the detailed 3D images, FD-OCT showed improved retinal coverage, image quality, and revealed information about the extent and the shape of retinal lesions. *See page 1492*

Telemedicine screening of ROP

Murakami *et al* report the 1-year experience of the Stanford University Network for Diagnosis of Retinopathy of Prematurity (SUNDROP) telemedicine initiative. 42 consecutively enrolled infants who met ROP examination criteria were screened by trained nurses with the RetCam II and images evaluated at the reading centre. All patients also received a dilated examination within 1 week of discharge from the hospital. The authors noted that none of the referral warranted ROP was missed (sensitivity 100%, specificity 95%). No patient progressed to retinal detachment. These results indicate that telemedicine may improve accessibility of ROP screening. *See page 1456*

LASIK re-treatment

Bragheeth *et al* report their results of LASIK re-treatment (32 eyes of 34 patients) for under correction or regression after primary LASIK procedures for myopia and myopic astigmatism. Re-treatment was performed by standard ablation based on the patient's residual refraction by lifting the original flap and cutting the epithelium around the flap edge with a fine needle. At 1-year follow-up, 56% of the eyes were within SE 0.50 D, 78% were within SE 1.00 D, and 78% of the eyes examined at 1-year post-re-treatment had unaided vision of 6/9 or better. Peripheral epithelial ingrowth not requiring treatment developed in two eyes. The authors conclude that LASIK

re-treatment for residual myopia, by lifting the original flap, is a safe and effective option. *See page 1506*

Retinal detachment after silicone oil removal

Avitabile *et al* investigated the effect of 360 degree laser retinopexy on the incidence of retinal detachment (RD) after silicone oil removal. In a prospective, randomised clinical trial, 303 patients (303 eyes) affected with primary (n = 211) or recurring (n = 92) rhegmatogenous RD treated by vitrectomy with silicone oil (1000 cSt) and endolaser photocoagulation of retinal breaks were randomised to receive 360 degree laser retinopexy. After at least 4 months, the silicone oil was removed in eyes with a fully attached retina (139 laser-treated eyes (92%) and 129 controls (85%)). In the laser group, 12 eyes (9%) developed RD as compared to the 27 eyes (21%) in the control group (p = 0.007). The authors conclude that the 360 degree laser retinopexy reduces the incidence of RD after silicone oil removal. *See page 1479*

A cleaning solution for silicone intraocular lenses

Liang *et al* compared the efficacy of perfluorobutylpentane (F4H5) and perfluorohexyloctane (F6H8) in dissolving silicone oil from the surface of silicone intraocular lenses (IOL). Droplets of silicone oil were applied to silicone lenses and washed off by repeated rinsing with F4H5 or F6H8. In addition, the silicone lenses of 11 patients with silicone oil remnants on the posterior IOL surface were rinsed intraoperatively with F4H5. The authors conclude that intraocular use of F4H5 is safe, and initial clinical data suggest its effectiveness as a cleaning agent after contact of silicone lenses with silicone oil. *See page 1522*