Case report
A 43-year-old woman had a subfoveal choroidal osteoma, sized four disc diameter, in her left eye. Best-corrected visual acuity (BCVA) was 20/20 in her right eye and 20/32 in her left eye. Ultrasonography and computed tomography showed an echodense mass.

On follow-up 4 years later, BCVA was decreased to 20/200 in her left eye and the mass showed subfoveal haemorrhage, suggesting the presence of CNV (Figure 1a). Optical coherence tomography (OCT) (Figure 1c) and early and late phase of fluorescein angiography (Figure 1e and g) confirmed the presence of classic CNV. The risks and benefits of the intravitreal injection of ranibizumab were explained to the patient and an informed consent was obtained. An intravitreal injection of 0.5 mg of ranibizumab was given. Six months after the treatment, subretinal haemorrhage resolved in fundus photograph (Figure 1b). OCT showed resolution of subretinal fluid (Figure 1d) and fluorescein angiography revealed cessation of leakage (Figure 1f and h). BCVA was increased to 20/100.

Comment

The reasons for vision loss from choroidal osteoma include CNV, subfoveal fluid, and photoreceptor degeneration. The cause of CNV development is unknown. But it has been hypothesized that the thinned, degenerated retinal pigment epithelium overlying the osteoma allows the growth of new blood vessels.[1]

Several treatments are tried but with limited success. Laser photocoagulation of CNV associated with choroidal osteoma was less effective owing to depigmentation of RPE that often reduces the absorption of laser energy.[1] The surgical removal of sufoveal CNV has been performed successfully, but the visual result has been poor.[2] Recently, PDT and transpupillary thermotherapy have been tried, but the visual result was also poor.[3–4] Intravitreal bevacizumab was carried out and improvement of visual acuity and regression of CNV was observed.[5] Ranibizumab has recently been used successfully for the treatment of CNV secondary to age-related macular degeneration.[6]

We used intravitreal ranibizumab for the treatment of CNV secondary to choroidal osteoma, and observed regression of CNV and recovery of visual acuity. This is the first report of ranibizumab for treating CNV related to choroidal osteoma. We propose that intravitreal ranibizumab may be a useful treatment in CNV secondary to choroidal osteoma. Long-term follow-up and further studies are required to confirm the role of intravitreal ranibizumab in CNV.

References

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Sir,

Irrigation of the capsular bag using a sealed-capsule irrigation device and 5-fluorouracil

This is the first reported case of cataract surgery where the empty capsular bag is sealed with PerfectCapsule® (Milvella Limited) and then irrigated with 5-fluorouracil (5-FU) for 3 min using a concentration of 50 mg/ml.[1] A hydrophilic acrylic intraocular lens (IOL; Bausch & Lomb (B&L) Akreos Adapt) was implanted into the capsular bag. The surgery and follow-up for 1 year have been uneventful. The lens capsule centrally and peripherally remains very clear.

Case report
A 63-year-old woman underwent right cataract surgery with a hydrophilic acrylic IOL ((B&L Akreos Adapt) implanted into the capsular bag. The capsulorhexis was 4.0 mm diameter. Before the implantation of IOL, and at the conclusion of irrigation/aspiration, PerfectCapsule was inserted into the anterior chamber filled with Provisc (Alcon Laboratories) and located over the capsulorhexis.[2] Suction through a syringe was applied, and the seal was tested for integrity using balanced salt with fluorescein. With the completion of sealing, 10 ml of 5-FU in a concentration of 50 mg/ml was irrigated through the capsular bag. The solution of 5-FU was stained with fluorescein to detect any leakage. After irrigation for 3 min with 5-FU, the capsular bag was flushed with 2 ml of balanced salt. The suction was then released and PerfectCapsule removed from the anterior capsule by simply pulling on the external tubing. The capsular bag was then filled with OVD and the B&L Akreos Adapt IOL inserted, using an injector, into the capsular bag. The entire procedure was uneventful.

The visual acuity is 20/20 corrected (−1.25 DS). The endothelial cell count postoperatively shows little

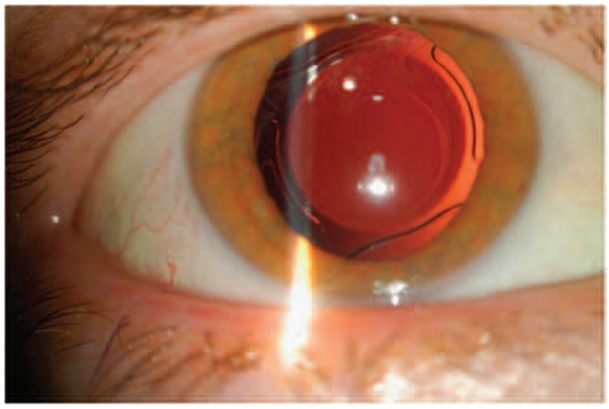

Figure 1 Three-month post-op. The anterior and posterior capsules are fused at the IOL periphery, and the overall capsule is clear.

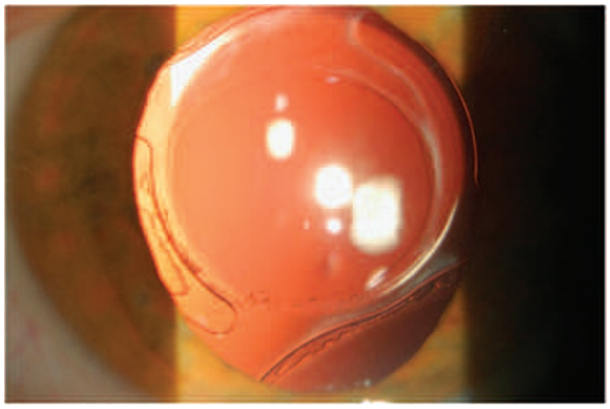

Figure 2 Twelve-month post-op. Note the clear posterior capsule centrally and peripherally. There is minimal fibrosis in the anterior capsule. The peppering on the anterior capsule inferiorly, over the IOL optic, was present at 3 months and remains unchanged.

reduction compared with the unoperated left eye of the patient.[3,4]

Clinical photographs are shown at 3 months (Figure 1) and 12 months (Figure 2). An ultrasound biomicroscope (UBM) image at 12 months is shown (Figure 3).

Comment

The 'specialised' IOLs under development will require changes in surgical technique to effect complete evacuation of lens epithelial cells from the capsular bag to ensure low posterior capsule opacification levels and a flexible capsular bag.[5]

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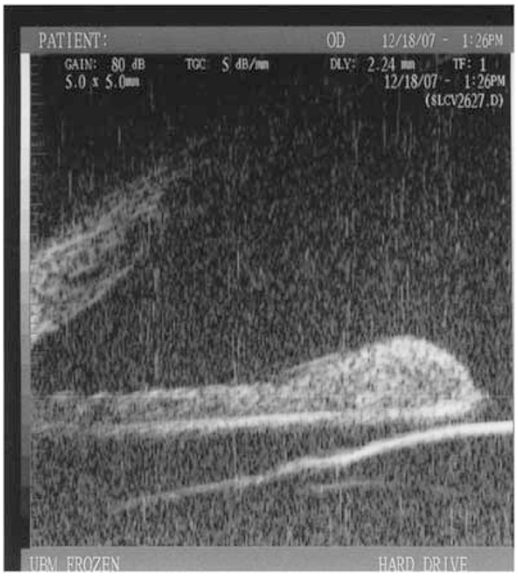

Figure 3 UBM image at 12-month post-op. Note the fused peripheral anterior and posterior lens capsules with no inclusions.

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Sir,

Diabetic macular oedema and erythropoietin

The study by Garcia-Arumi *et al*[1] was of engaging interest. The authors conclude that erythropoietin (EPO) has a neuroprotective role in diabetic macular oedema (DME). In addition to the limitations of this study, lucidly highlighted by the authors, we demur on some of the methodological constraints of this study.