# References

- 1 Dean WH, Banda L, Kambewa ES, Sherwin JC. Increased intraocular pressure on the first post-operative day following sutureless extracapsular cataract surgery in Africa. *Eye* 2012; **26**: 332.
- 2 Kim JY, Jo MW, Brauner SC, Ferrufino-Ponce Z, Ali R, Cremers SL *et al*. Increased intraocular pressure on the first postoperative day following resident-performed cataract surgery. *Eye* (*Lond*) 2011; **25**: 929–936.

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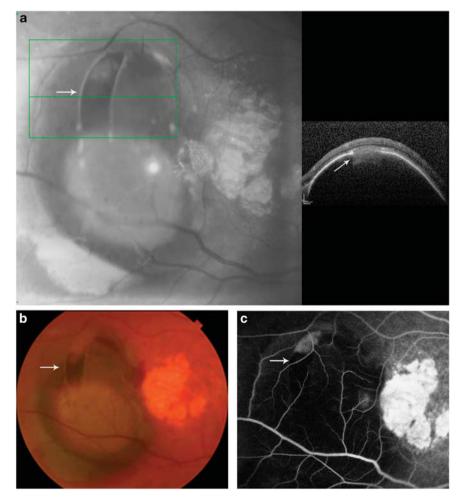
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#### Sir, Retinal pigment epithelial tear resembling retinal tear

## Case report

A 74-year-old Caucasian female with history of advanced age-related macular degeneration presented with decreased vision in the right eye. The patient was treated with two ranibizumab injections for choroidal neovascularization 5 months prior without



**Figure 1** (a) SD-OCT showing RPE defect with overlying intact retina. (b) Fundus photograph showing geographic atrophy and elevated lesion with RPE tear resembling retinal tear in the posterior pole. (c) Fluorescein angiography.

improvement. Subsequently, two bevacizumab injections were administered over 2 months with the last one being 4 weeks ago. On examination, visual acuity was 20/50 in the right eye and CF at 2 ft in the left. The left eye had a disciform scar due to choroidal neovascularization. Best-corrected visual acuity was 20/40 in the right eye 1 month ago. Fundus examination showed a well-demarcated area of geographic atrophy, an elevated lesion (characteristic of pigment epithelial detachment (PED)) with haemorrhages at the periphery and sub-retinal fluid. In addition, there was a lesion in the posterior pole clinically resembling a retinal tear. Spectral domain optical coherence tomography (OCT) confirmed a retinal pigment epithelial (RPE) tear with intact retina. Figure 1 shows the SD-OCT with a hyperflourescent layer, representing the RPE layer. There is a focal disruption in the RPE with the overlying retinal integrity maintained. The patient was observed closely and bevacizumab injections were continued monthly. The patient's vision has remained stable in the right eve for 5 months.

#### Comment

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The incidence of RPE tear is 1–27% following treatment with anti-VEGF therapy.<sup>1–3</sup> RPE tears are most often associated with PED,<sup>1</sup> with height and diameter of PED reported as risk factors.<sup>3,4</sup> After anti-VEGF injections, tears are attributed to the rapid contraction of the neovascular membrane resulting in significant tangential stress on the RPE.<sup>1</sup> They are reported to occur most often between 4 and 8 weeks of initiation of anti-VEGF therapy,<sup>1,5</sup> such as in our patient. Although RPE tears occur spontaneously, the temporal relationship between the anti-VEGF injection and the tear must be taken into consideration. Treatment of RPE tear is not well established. However, similar to our patient, continuation of anti-VEGF therapy has been reported to stabilise visual acuity.<sup>1</sup> Vision should improve provided the fovea is not involved.<sup>2</sup>

#### **Conflict of interest**

The authors declare no conflict of interest.

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### References

- 1 Chang LK, Sarraf D. Tears of the retinal pigment epithelium: an old problem in a new era. *Retina* 2007; **27**: 523–534.
- 2 Sarraf D, Reddy S, Chiang A, Yu F, Jain A. A new grading system for retinal pigment epithelial tears. *Retina* 2010; **30**(7): 1039–1045.
- 3 Smith BT, Kraus CL, Apte RS. Retinal pigment epithelial tears in ranibizumab-treated eyes. *Retina* 2009; 29(3): 335–339.
- 4 Chan CK, Abraham P, Meyer CH, Kokame GT, Kaiser PK, Rauser ME *et al.* Optical coherence tomography-measured pigment epithelial detachment height as a predictor for

retinal pigment epithelial tears associated with intravitreal bevacizumab injections. *Retina* 2010; **30**(2): 203–211.

- 5 Chan CK, Meyer CH, Gross JG, Abraham P, Nuthi AS, Kokame GT *et al.* Retinal pigment epithelial tears after bevacizumab injection for neovascular age-related macular degeneration. *Retina* 2007; 27: 541–551.
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## Sir,

## Eyelid anaesthesia using tetracaine gel in the treatment of paediatric superglue tarsorrhaphy

We report a novel technique of topical eyelid anaesthesia to permit treatment of ocular superglue injury in a child, thereby avoiding the need for general anaesthetic.

### Case report

A five-year-old girl presented to Ophthalmic A&E 1 h following accidental instillation of cyanoacrylate nail bonder into her right eye. The eyelids were completely glued together. The globe could not be seen but was felt to be mobile. After discussion with the mother, an initial attempt at cutting the eyelashes was made, but the lashes could not be trimmed to less than 3 mm as this caused discomfort (Figure 1a). As a result, tetracaine 4% gel (Ametop, Alcon Laboratories (UK) Ltd, Hemel Hempstead, UK) was applied onto the upper and lower eyelids (Figure 1b). After 15 min, there was adequate evelid anaesthesia for the evelashes of the lower lid to be cut one-by-one at their base using Vannas scissors with the child awake and supine. This allowed the eye to open completely revealing no corneal damage (Figure 1c). She was treated with oc dexamethasone/neomycin/ polymyxin B (Maxitrol, Smith & Nephew Healthcare Ltd, Hull, UK) q.i.d. for a week and made a full recovery (Figure 1d).

#### Comment

Several reports of superglue (cyanoacrylate) causing ocular injury have been documented over the last three decades.<sup>1,2</sup> Cyanoacrylate adheres most strongly to dry surfaces such as the eyelid margins and the eyelashes. This can cause the lids to rapidly bind shut, termed a 'superglue tarsorrhaphy', making examination and irrigation impossible.<sup>2</sup> Conservative management is often adopted as the glue spontaneously comes off within a week.<sup>3</sup> In younger children, however, there is a concern that unilateral visual deprivation for that period may cause amblyopia, and therefore cutting the lashes