Sir,

Self-inflicted anterior scleritis

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Prompt diagnosis and aggressive management of scleritis are essential because of its association with sight and often life-threatening complications. We report a patient with anterior scleritis that appeared to be resistant to intensive immunosuppressive therapy. This, along with several other objective observations, eventually led to the diagnosis of self-inflicted (factitious) anterior scleritis. Factitious scleritis is a diagnosis of exclusion that should be considered in patients with any unexplained, nonresponding signs in the presence of incriminating findings.

Case report

A 37-year-old Caucasian woman initially presented with a mild, bilateral anterior uveitis that resolved with topical steroid therapy. She subsequently developed bilateral, painful, red eyes with visual acuities of 6/18 right and 6/24 left. Bilateral anterior scleritis was diagnosed, which failed to respond to oral nonsteroidal anti-inflammatory drugs, oral and pulsed intravenous corticosteroids, intravenous cyclophosphamide, intravenous immunoglobulin, cyclosporin, methotrexate and mycophenolate.

In the medical history there were complaints of left-sided hearing loss, a few episodes of oral ulceration, and unexplained sensory loss over the left leg. The possibilities of atypical Cogan's syndrome, Wegener's granulomatosis and Behçet's disease were considered. All investigations for an underlying systemic disease were normal, including various autoantibodies and a CT scan of head and sinuses. Over the next 2 years she had frequent flare-ups of anterior scleritis, mainly involving the inferior half of both sclera, which failed to respond despite the use of many immunosuppressive agents. At some clinic visits, localised areas of inferior conjunctival and corneal epithelial loss along with excoriation of the lids and malar regions could be seen (Figure 1). On one occasion, after a single dose of intravenous cyclophosphamide, she shaved her head claiming to have experienced extensive hair loss. On another occasion, she had a dilated left pupil that resolved spontaneously. No cause could be identified and she denied using dilating drops. Finally, she reported bilateral complete loss of vision (no perception of light); however, she was seen to be navigating well in the clinic area. The pupillary reactions and fundoscopy were normal and blephrospasm was noted on shining bright light into the eyes. Extensive investigations including CT and MRI scans, B scan ultrasound of the orbits, electrodiagnostic tests and fluorescein angiography were normal.

It was concluded that other than the initial uveitis, all her ocular problems were self-inflicted. She was gradually weaned off the medications and referred for psychiatric assessment. She was diagnosed to be suffering from agitated depression. Over the same time period as her scleritis there had been two deaths in the immediate family, one from disseminated malignancy where hair loss had occurred following chemotherapy and another from suicide.

Comment

Factitious disorders are self-inflicted medical conditions. The most common factitious ophthalmic problem described is functional visual loss.[1] Self-inflicted eye injuries are rare. In one literature review, all patients with

Figure 1 Inferior scleral, episcleral and conjunctival injection, with associated conjunctival epithelial loss.

self-inflicted eye injuries suffered from some kind of psychotic disorder. One-third also showed some other type of self-injurious behaviour.[2]

Self-inflicted scleritis is unusual,[3] but our case had several clues to its factitious nature that had been documented in other reports. Only the inferior sclerae were involved and on more than one occasion excoriation of the skin of the lids and malar regions was noted,[4] suggesting instillation of some toxic substance. The sites of maximal involvement and the unexplained corneal and conjunctival defects were typical of factitious eye disease.[3,5] Compliance was questionable, as she never showed Cushingoid features despite a prolonged prescription of high doses of oral corticosteroids. The suspected pharmacological anisocoria and unexplained visual loss also aided in making the diagnosis.[1,3] Recent death in the family has also been shown to be associated.[5]

A prompt, correct diagnosis would have saved time, the expense of investigations, and the administration of unnecessary, potentially toxic medications. Psychiatric evaluation is strongly recommended to identify and address underlying psychiatric problems.

References

1 Keltner JL, May WN, Johnson CA, Post RB. The California syndrome. Functional visual complaints with potential economic impact. *Ophthalmology* 1985; **92**: 427–435.
2 Kennedy BL, Feldmann TB. Self-inflicted eye injuries: case presentations and a literature review. *Hosp Community Psychiatry* 1994; **45**: 470–474.
3 Zamir E, Read RW, Rao NA. Self-inflicted anterior scleritis. *Ophthalmology* 2001; **108**: 192–195.
4 Ugurlu S, Bartley GB, Otley CC, Baratz KH. Factitious disease of periocular and facial skin. *Am J Ophthalmol* 1999; **127**: 196–201.
5 Jay JL, Grant S, Murray SB. Keratoconjunctivitis artefacta. *Br J Ophthalmol* 1982; **66**: 781–785.

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Sir,

Sanichlor-induced atopic dermatitis and asthma in ophthalmologists

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We report cases of atopic dermatitis and severe asthma following chronic exposure to Sanichlor (sodium dichloroisocyanurate), which was being used for disinfection of tonometer heads. This is the first such report in the literature.

Case report

Sanichlor was introduced as a disinfectant for tonometer heads at the Southampton eye unit in September 1994. A 1:1000 dilute solution was prepared from each Sanichlor tablet in a lay-up area of the minor operations room and then distributed to eye casualty, outpatient cubicles and the ward. After a few days, a male ophthalmologist reported fingertip changes as well as breathing difficulties, while a female colleague developed fingertip changes and increasingly severe generalised urticaria followed by angioedema of lips. Both ophthalmologists reported improvement in their symptoms by avoiding contact with Sanichlor. Seven years later the female ophthalmologist noticed increasing breathing problems, coinciding with her work in the minor operations room. She kept a diary of these events and found that her breathing difficulty was worsened on days she had been working in the minor operations room and began to remit at weekends and holidays. She was diagnosed in March 2001 to have late-onset asthma. Nocturnal dyspnoea became a major problem despite the use of long-acting bronchodilators, high-dose inhaled steroids and frequent relieving doses of short-acting bronchodilators. During this period, her general health had deteriorated to the point that she was contemplating discontinuing her work in the eye unit. Another female ophthalmologist who joined the unit in 1996 also reported the development of severe fingertip dermatitis. Skin patch testing done at Occupational Health was unhelpful, but she discovered that avoidance of Sanichlor solution helped her skin problem. After consultations with the Occupational Health Department, a decision to change the disinfectant for sterilising tonometer heads was taken in August 2001. Hydrogen peroxide 3% was chosen as a suitable alternative disinfectant[1] for sterilising tonometer heads throughout the eye unit and allied peripheral clinics. Since then the first female ophthalmologist has had a significant improvement in her general health, but remains dependent on antihistamines, bronchodilators and inhaled steroids.