

Z Chaudhuri¹ and R Saxena²

¹Department of Ophthalmology, Government Medical College, Sector 32 Chandigarh 160047, India

²Dr R P Center for Ophthalmic Sciences All India Institute of Medical Sciences New Delhi 110029, India

Correspondence: Z Chaudhuri
E-310, Purvasha Anand Lok Society
Mayur Vihar, Phase 1, New Delhi-110091, India
Tel: +91 011 22759613
Fax: +91 011 22792342
E-mail: drzia@bol.net.in;
ziachaudhuri@hotmail.com

Eye (2005) **19**, 232–234. doi:10.1038/sj.eye.6701436
Published online 25 June 2004

Sir,
Coexistence of optic disc drusen and idiopathic intracranial hypertension in a child

The coexistence of optic disc drusen (ODD) and idiopathic intracranial hypertension (IIH) was first described in an adult in 1979.¹ To date there have been eight cases reported in the literature,^{1–4} but to our knowledge this is the first report in a child.

Case Report

An 11-year-old girl was referred with possible papilloedema. She admitted to a 2-week history of headaches, but was otherwise well. There was no relevant past medical history.

Her visual function was normal with enlarged blind spots present bilaterally. Fundoscopy revealed anomalous discs, suggestive of papilloedema. An urgent paediatric referral was made. Following a normal CT brain, lumbar puncture revealed an elevated cerebral spinal fluid (CSF) pressure of 40 cm of water. CSF analysis was normal. A diagnosis of IIH was made and treatment with acetazolamide commenced (500 mg mane, 750 mg lunch, and nocte), which controlled the CSF pressure at 10 cm of water. The headaches resolved.

On follow up at the Eye Unit, ODD were identified (Figure 1) and confirmed by B-scan

ultrasonography. The diagnosis of IIH was therefore questioned, although the neurological opinion was that the CSF pressure measurements were accurate and that the two conditions must be in coexistence.

The patient's visual acuities have remained 6/4 and there has been no deterioration in the visual fields to date. She continues under neurological and ophthalmological follow up.

Comment

ODD are hyaline-containing bodies that begin 'buried' in the substance of the optic nerve, migrate forward with age and become visible around the second decade.^{4,5} They occur in 3.4–24 per 1000 population and are bilateral in approximately 75% of cases.⁴ Impairment of visual acuity is rare, but visual field defects may occur in up to 50%,⁶ although generally are not significant, and patients remain asymptomatic. Follow-up is not required.

IIH is characterized by increased intracranial pressure in the presence of normal imaging. It is relatively uncommon in childhood, presenting once or twice a year to a large referral centre.⁸ The headache is often frontal and severe and occasionally associated with vomiting. Transient visual obscurations may occur, although may be described by children as 'blurring or mistiness'. The papilloedema is typically bilateral and symmetrical.⁹

Disregarding ODD, the diagnosis of IIH in children may be challenging. Apart from the difficulties in examination, accurate imaging, and lumbar puncture assessment may require separate anaesthetics. Also, the normal range for CSF pressure in children has not been established and general anaesthesia may artificially increase measurements.⁸

This case emphasizes the importance of detailed clinical history taking in children with presumed pseudopapilloedema. In the setting of IIH, the finding of ODD may lead to diagnostic confusion causing delay in appropriate management. Enquires must



Figure 1 On follow-up optic disc drusen were identified.

be made with regard to neurological symptoms prior to accepting the diagnosis of pseudopapilloedema.

References

- 1 Katz B, Van Patten P, Rothrock JF, Katzman R. Optic nerve head drusen and pseudotumour cerebri. *Arch Neurol* 1988; **45**: 45–47.
- 2 Reifler DM, Kaufman DO. Optic disc drusen and pseudotumour cerebri. *Am J Ophthalmol* 1988; **106**: 95–96.
- 3 Krasnitz I, Beiran I, Mever E, Miller B. Coexistence of optic nerve head drusen and pseudotumour cerebri: a clinical dilemma. *Eur J Ophthalmol* 1997; **7**: 383–386.
- 4 Jacome DE. Headaches, IIH and pseudopapilledema. *Am J Med Sci* 1998; **316**(6): 408–410.
- 5 Auw-Haedrich C, Staubach F, Witschel H. Optic disc drusen. *Surv Ophthalmol* 2002; **47**(6): 515–532.
- 6 Antcliff RJ, Spalton DJ. Are optic disc drusen inherited? *Ophthalmology* 1999; **106**(7): 1278–1281.
- 7 Hoover DL, Robb RM, Petersen RA. Optic disc drusen in children. *J Pediatr Ophthalmol Strabismus* 1988; **25**(4): 191–195.
- 8 Yourorkosd S, Psychou F, Fryssiras S *et al*. Idiopathic intracranial hypertension in children. *J Child Neurol* 2000; **15**: 453–457.
- 9 Soler D, Cox T, Bullock P, Calver DM, Robinson RO. Diagnosis and management of benign intracranial hypertension. *Arch Dis Child* 1998; **78**(1): 89–94.
- 10 Taylor D (ed.). *Paediatric Ophthalmology*. Blackwell Science: Oxford, 1997; 1066.
- 11 Corbett JJ, Thompson HS. The rational management of idiopathic intracranial hypertension. *Arch Neurol* 1989; **46**: 1049–1051.

JD Rossiter, AJ Lockwood, AR Evans
Queen Alexandra Hospital Portsmouth, UK

Correspondence: JD Rossiter,
Tel: +44 7753571947
Fax: +44 2392286440
Email: jon@jonandabi.fsnet.co.uk

Eye (2005) **19**, 234–235; doi:10.1038/sj.eye.6701430
Published online 13 August 2004

Sir,
Alternate total ophthalmoplegia and optic neuropathy associated with ulcerative colitis

Ulcerative colitis (UC) is an idiopathic, nonspecific inflammatory bowel disease involving primarily the mucosa and submucosa of the colon and occasionally manifests extraintestinal complications.^{1–4} In the ophthalmic field, conjunctivitis, episcleritis, and iridocyclitis as well as optic neuritis and retinal vasculitis

have been reported.^{3,4} Here, we present a case of alternate total ophthalmoplegia and optic neuropathy presumably due to vasculitis and ischaemia associated with UC.

Case report

A 50-year-old Japanese man was referred to our hospital on 30 October, 1994, because of a sudden onset of retrobulbar pain on 5 August, visual loss on 8 October, and ophthalmoplegia on 29 October, in the right eye. He had an 18-year history of UC, which was histopathologically confirmed at the right hemicolectomy in 1975, and had been treated with salazopyrin. He had no past history of migraine, varicella-zoster infection, Behcet's disease, and collagen diseases other than UC. The right eye showed blepharoptosis, total ophthalmoplegia, and decreased corneal sensitivity (Figure 1a). Best-corrected visual acuity was hand motion in the right eye and 20/20 in the left. Anterior segments and media were normal except for fixed mydriasis of the right pupil. Findings of the optic disc and retina were unremarkable (Figure 2a). Goldmann's perimetry

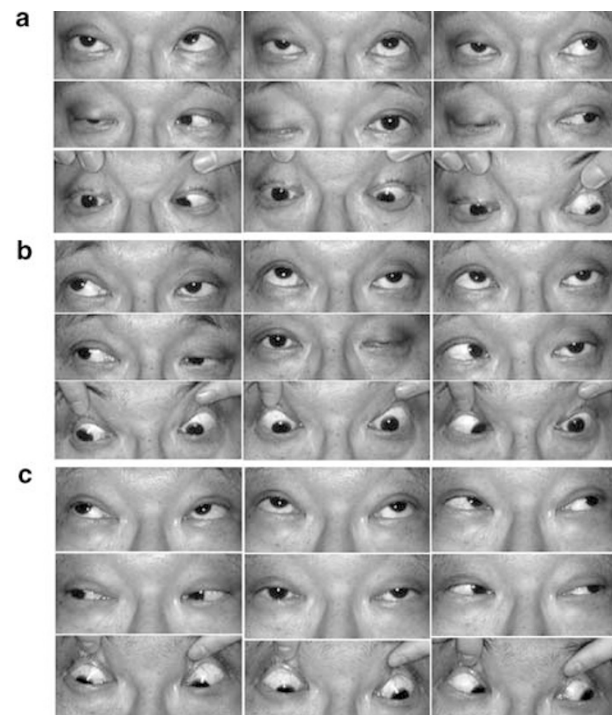


Figure 1 Diagnostic positions of gaze. (a) On 30 October 1994, blepharoptosis and total ophthalmoplegia in the right eye are shown. (b) On 28 January 1995, ophthalmoplegia is apparent in the left eye. Note that the right ocular movement is normal. (c) On 16 February 1995, 18 days after steroid therapy, eye movement is bilaterally normal.