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SHORT COMMUNICATION

Intravitreal triamcinolone acetonide in Vogt-Koyanagi-Harada syndrome

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PURPOSE. *To report the results of intravitreal triamcinolone acetonide in two eyes of a patient with Vogt-Koyanagi-Harada syndrome.*
METHODS. *A 24-year-old woman with Vogt-Koyanagi-Harada syndrome was treated with a single 4-mg dose of intravitreal injection of triamcinolone acetonide in both eyes.*
RESULTS. *On the seventh day after injection, visual acuity improved from 20/50 to 20/20 in the right eye and from 20/100 to 20/32 in the left. One month after injection, visual acuity was 20/20 in the right eye and 20/32 in the left, and fluorescein angiography showed that serous detachment had almost completely resorbed. The ocular examination remained stable during the 8-month follow-up period.*
CONCLUSIONS. *In this study, a prompt improvement in the clinical picture of a patient with Vogt-Koyanagi-Harada syndrome after intravitreal triamcinolone acetonide injection was described. The results suggest that intravitreal triamcinolone acetonide injection may be an additional tool in the treatment of Vogt-Koyanagi-Harada syndrome. (Eur J Ophthalmol 2006; 16: 481-3)*

KEY WORDS. *Vogt-Koyanagi-Harada syndrome, Intravitreal triamcinolone acetonide*

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INTRODUCTION

Vogt-Koyanagi-Harada syndrome is a systemic disorder involving multiple organ systems, including the ocular, auditory, nervous, and integumentary systems. Severe bilateral panuveitis associated with exudative retinal detachment is the hallmark of ocular disease. High-dose systemic corticosteroid therapy has become the mainstay treatment for Vogt-Koyanagi-Harada syndrome and secondary side effects are frequent (1). The purpose of the present study was to report the use of intravitreal triamcinolone acetonide in two eyes of a patient with Vogt-Koyanagi-Harada syndrome.

Case report

A 24-year-old otherwise healthy woman was presented with blurred vision in both eyes for 3 days associated with headache and dysacusia. Visual acuity was 20/50 in the right eye and 20/100 in the left. Anterior segment examination was normal in both eyes. Funduscopy of both eyes demonstrated papillitis and serous retinal detachments as well as intraretinal edema. Intraocular pressure was 14 mm Hg in both eyes. Fluorescein angiography showed multiple hyperfluorescent leaking foci of retinal pigment epithelium in the early phase with rapid dye staining, resulting in enlargement and coalescence of lesions (Fig. 1, A and B). Optical coherence tomography showed large multiple serous retinal detachments involving the macular area (Fig. 1, C and D). She was treated with a single 4-mg dose of intravitreal injection of triamcinolone acetonide (Kenacort-A; 40 mg /mL, Bristol-Myers Squibb Co, Princeton, NJ) in both eyes. The left eye was treated 2 days prior to the right eye. The patient was fully informed about the experimental character of the treatment and had signed an informed consent. After 1 week the serous

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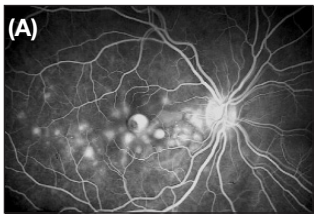
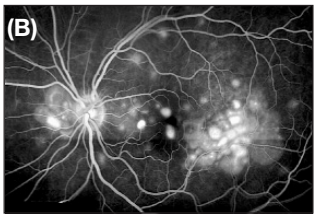
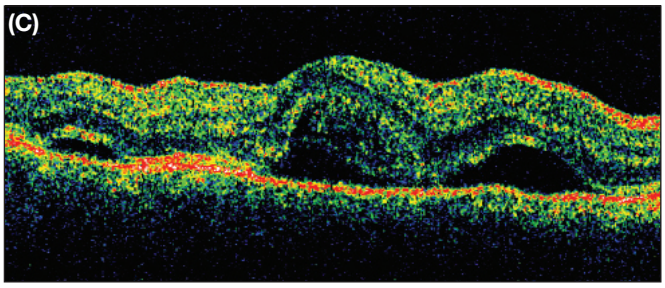






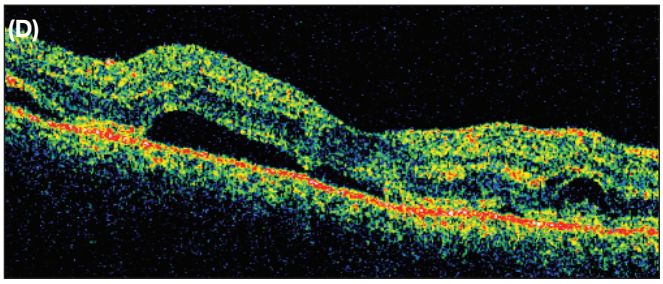
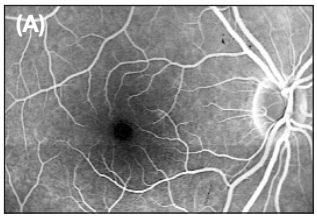
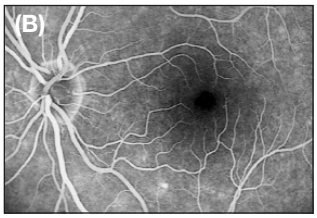
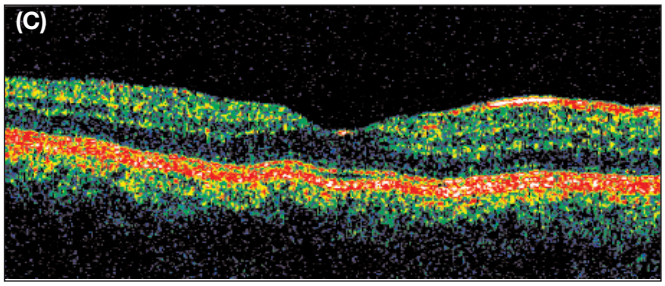


Fig. 1 - *Fluorescein angiography of the left (**A**) and the right eye (**B**) showed multiple hyperfluorescent leaking foci of retinal pigment epithelium in the early phase with rapid dye staining, resulting in enlargement and coalescence of lesions. Optical coherence tomography of the left (**C**) and the right eye (**D**) showed large multiple serous retinal detachments involving the macular area.*







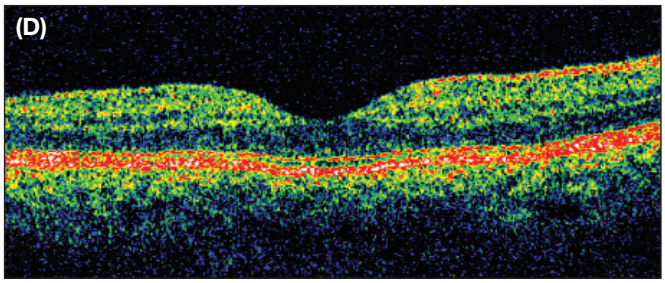


Fig. 2 - *On the seventh day after injection, optical coherence tomography of the left (**A**) and the right eye (**B**) showed that the serous detachment had completely resorbed. At 1 month after injection, fluorescein angiography of the left (**C**) and the right eye (**D**) showed that the serous detachment had completely resorbed.*

retinal detachments had disappeared and visual acuity was 20/20 in the right eye and 20/32 in the left (Fig. 2, A and B). Dysacusia was disappeared spontaneously within 10 days. One month after injection, visual acuity was 20/20 in the right eye and 20/32 in the left, and fluorescein angiography showed that serous detachment had almost completely resorbed (Fig. 2, C and D). The ocular examination remained stable during the 8-month follow-up period. During follow-up, no injection-related complications were encountered.

DISCUSSION

Intravitreal triamcinolone acetonide has recently been applied as treatment of various intraocular neovascular, proliferative, or edematous diseases (2, 3). It was also shown that intravitreal triamcinolone acetonide might be an additional tool in the treatment for sympathetic ophthalmia and Vogt-Koyanagi-Harada syndrome, which are T-cell–mediated granulomatous inflammatory diseases affecting primarily the choroid and anterior uvea (4, 5). The rationale for intravitreal corticosteroids parallels that established for other routes of corticosteroid administration, specifically the anti-inflammatory effect. However, the intravitreal route alleviates the pharmacologic issues of penetration and bioavailability. A potent dose of medication is delivered directly to its site of action with rapid onset.

We have described prompt improvement in the clinical picture of a patient with Vogt-Koyanagi-Harada syndrome after intravitreal triamcinolone acetonide injection. The re-

sults suggest that intravitreal triamcinolone acetonide injection may be an additional tool in the treatment of Vogt-Koyanagi-Harada syndrome. Moreover, systemic corticosteroid use may be spared, shortened, or even eliminated in selected cases of this disease when managed with intravitreal corticosteroids.

The authors have no proprietary interest in the material used in this study.

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